Author's Note

Dr. Richard Dale, a barrister and economist, is currently a Visiting Scholar at the Brookings Institution and a Rockefeller Foundation International Relations Fellow. Formerly, he was an executive with merchant bankers N.M. Rothschild and Sons, Ltd., in London.

R 5025-1 9

Bank Supervision Around the World

Richard Dale

Published by
Group of Thirty©
New York
1982

Bank Supervision Around the World, Copyright © 1982 by The Group of Thirty, New York, New York. All rights reserved. Printed in the United States of America.

Library of Congress Cataloging in Publication Data

Dale, Richard.
Bank supervision around the world.

(Study group reports)
1. Banking law. 2. Banks and banking, International—Law and legislation. I. Title.
K1066.D34 1982 346.082 82-11877
342.682

Bank Supervision Around the World

Table of Contents

		Page
Preface		1
Summary and Findings		2
I.	**International Supervisory Co-operation**	4
II.	**Overview of National Regulation Arrangements**	7
	A. Preventive Regulation	7
	1. *Market Entry*	7
	2. *Capital Adequacy*	8
	3. *Liquidity Control*	9
	4. *Permissible Business Activities*	11
	5. *Loan Concentrations and Country Risk*	11
	6. *Foreign Currency Exposure*	13
	7. *Bank Inspection*	13
	B. Deposit Insurance	14
	C. Lender of Last Resort	16
III.	**Country Surveys**	18
	A. Belgium	18
	B. Canada	21
	C. France	25
	D. Germany	29
	E. Hong Kong	33
	F. Italy	37
	G. Japan	41
	H. Luxembourg	45
	I. The Netherlands	47
	J. Singapore	51
	K. Switzerland	54
	L. United Kingdom	58
	M. United States	62
	N. Observation Ratios Adopted by the EEC Advisory Banking Committee	68

Bank Supervision Around the World

Preface

The present study reflects concerns arising out of the recent rapid expansion of international lending and the growing tendency for banks to service their international business from offices established outside their home country. The emergence of global banking networks straddling numerous national jurisdictions poses special problems for supervisory authorities. Firstly, international lending may involve risks additional to and distinct from those experienced in domestic banking operations. Secondly, unless national regulatory responsibilities are carefully co-ordinated there is a danger that some kinds of banking activity may escape supervision. Thirdly, uneven regulatory practices can lead to a situation in which banks are drawn to the most permissive regimes. And, more generally, the increasing interdependence of banks and banking systems points to the need for a global approach to the problems of bank safety and soundness.

This study does not address the complex policy issues associated with the growth of multinational banking. Rather, it provides a descriptive overview of prudential regulation in the major financial center countries in the hope that this may help to identify those areas in which there is scope for further international co-ordination.

The study is divided into four sections comprising (1) summary and findings; (2) a brief description of international supervisory co-operation; (3) a comparative survey of national regulatory arrangements and (4) a survey of regulatory practices in each of the Group of Ten countries (other than Sweden), Switzerland, Hong Kong and Singapore.

This study is part of the ongoing work of the International Banking Study Group.

Summary and Findings

Every national financial system has distinctive institutional characteristics which have a direct bearing on the authorities' approach to bank regulation. Some countries have a highly concentrated banking industry favoring an informal regulatory regime based on direct contact with management, while others have a fragmented structure calling for more formal methods of control. Similarly, where supervisory responsibility is vested in a ministry of finance or central bank it is likely to be exercised with a wider degree of discretion than in those countries where a banking commission, operating within defined statutory limits, is the primary supervisory agency. In some countries regulatory arrangements may vary, depending on whether a bank has a national or regional base or whether it is federally or state chartered. Finally, the concept and definition of a 'bank' varies from country to country and deposit-taking institutions may, for regulatory purposes, be differentiated according to whether or not they enjoy full banking status.

Despite these and other institutional differences between countries, certain common trends in regulatory practice have emerged in recent years, due in part to growing international co-operation in this area. In the first place there has been a tendency towards a more formal regulatory framework even in those countries which have traditionally preferred a non-statutory approach to bank supervision. Secondly, several countries have in recent years extended their regulatory coverage to non-bank deposit-taking institutions. Thirdly, most countries now endorse the principle of parental responsibility in the sense that they delegate a major share of supervisory responsibility to the home country authorities of foreign branches to whom they are host, while exercising some degree of supervisory control over the foreign establishments of banks headquartered within their jurisdiction. In a related development, most national authorities are beginning to use consolidated data when applying solvency and other prudential criteria to locally incorporated banks with foreign branches and subsidiaries.

While recognizing such signs of gradual convergence in national regulatory arrangements, the present study also highlights a number of areas where regulatory disparities and gaps persist. It is suggested that the following potential sources of weakness in the international regulatory regime need to be addressed:

1. Some financial centers have endorsed the principle of parental responsibility to the point where they are relying heavily on home country authorities for the supervision of foreign banks to whom

they are host. On the other hand not all home country authorities are prepared to accept the degree of responsibility placed upon them in this way. The result is that certain banks may, for some purposes at least, be largely unsupervised.

2. A closely related cause for concern is that the principle of consolidated supervision which was accepted by the Group of Ten Governors in 1978 has been implemented only selectively. For instance, official monitoring of foreign exchange and country risk exposure frequently overlooks the activities of banks' foreign subsidiaries.

3. In many instances, neither host nor home country authorities monitor or regulate liquidity in the Euro-currency markets. This is also an area where the Basle Concordat's guidelines are unclear.

4. Although most countries are beginning to assess capital requirements on a consolidated basis there is no common approach to the definition of capital and still less to the question of what constitutes capital adequacy.

5. To the extent that restrictions on permissible business activities reflect prudential considerations, it is a matter for concern that banks can in some cases escape these limitations when operating in foreign markets.

6. In the key area of country risk exposure, most national authorities are still feeling their way towards appropriate methods of identifying, measuring and controlling risks. In the absence of established supervisory procedures banks are typically free to establish their own exposure limits for country risk.

7. The role of on-site bank examinations varies from country to country but in several jurisdictions foreign regulatory authorities are not permitted to inspect banks for which they retain supervisory responsibility. In such jurisdictions, too, the host authorities may be prevented by bank secrecy laws from communicating information about locally based banks to foreign supervisors. Under these circumstances the principle of parental responsibility cannot be fully implemented.

8. Not all countries have deposit insurance schemes and those that do offer widely differing coverage with respect to the size, type, cur-

rency denomination and situs of deposits. In order to avert the danger that perceived differences in national protective arrangements could provoke destabilizing capital movements in times of uncertainty, greater co-ordination in this area is desirable.

9. For similar reasons, it is a matter for concern that lender of last resort facilities differ considerably from country to country. A few financial centers have no lender of last resort capacity. Some national authorities can provide only temporary liquidity assistance on a secured basis, while others are able and willing to sustain even insolvent institutions in order to protect depositors. These disparities apart, there is a danger that some authorities may be prevented from extending collateralized assistance to banks' foreign branches where national laws confer on branch depositors preferential claims to branch assets.

These findings are broadly consistent with a recent Group of Thirty survey* of bankers' attitudes towards the international financial market. From this it is clear that banks themselves perceive sharp differences in national regulatory arrangements, although their concerns in this area tend, understandably, to be more of a competitive than a prudential nature. It is significant that North American banks, in particular, believe they suffer a competitive disadvantage as a result of extensive domestic regulation, notably with respect to loan size requirements and restrictions on permissible activities as well as capital requirements. It is also significant that a large majority of both North American and European banks surveyed would like to see greater harmonization of regulatory requirements.

* "How Banks See the World Financial Market", Group of Thirty, May, 1982.

I. International Supervisory Cooperation

The techniques of supervision lagged the internationalization of banking through the early 1970s. As Peter Cooke of the Bank of England has put it, "neither the supervisors, nor indeed the banks themselves had fully appreciated the degree to which the banking environment was changing in character and the new increased risks involved in international business. Supervisors were still very much domestically oriented within the framework of different national banking systems."

The financial disturbances of 1974 focused attention on the need for greater international co-operation in the field of bank supervision. In September 1974, the central bank governors issued a statement of assurance that temporary support for banks in need of liquidity was available. They also created a standing committee of bank supervisors, under the auspices of the Bank for International Settlements, comprising the Group of Ten countries plus Switzerland. This Committee on Bank Regulations and Supervisory Practices (now called the "Cooke Committee," after its chairman) meets three times a year, its members working cooperatively to coordinate surveillance over the international banking system and sharing ideas about adapting their various national supervisory systems to deal effectively with the changing banking environment.

One of the earliest and most far-reaching initiatives of the Cooke Committee was to develop broad guidelines for the division of responsibilities between national supervisory authorities. These guidelines, which were approved by the Central Bank Governors of the Group of Ten in December 1975, are known as the "Basle Concordat" and have been described by Peter Cooke as "a most important cornerstone of international supervisory co-operation". The following key principles are embodied in the Concordat:

1. The supervision of foreign banking establishments is the joint responsibility of parent and host authorities;
2. No foreign banking establishment should escape supervision;
3. The supervision of liquidity should be the primary responsibility of the host authorities;
4. The supervision of solvency is essentially a matter for the parent authority in the case of foreign branches and primarily the responsibility of the host authority in the case of foreign subsidiaries;
5. Practical co-operation should be promoted by the exchange of information between host and parent authorities and by the authorization of bank inspections by or on behalf of parent authorities on the territory of the host authority.

Another important initiative of the Cooke Committee has been to recommend to the Governors that the supervision of banks' international business should be conducted on a consolidated basis. The reasoning here is that consolidated supervision enables parent supervisors to view each banking group's risk exposure and capital adequacy on a global basis while making it impossible for a bank to evade regulation applied to the parent by transferring business to foreign establishments. The consolidation principle was endorsed by the Group of Ten Governors in 1978 and is now being implemented.

The Cooke Committee has taken steps to disseminate information about its work more widely around the world with a view to establishing a broader basis for supervisory co-operation. The Committee has for instance, initiated a series of discussions with a recently constituted group of supervisors from offshore centers for which Hong Kong is currently co-ordinator. The two international conferences for bank supervisors, held in London in 1979 and Washington in 1981, have also provided an opportunity for an exchange of views on the Committee's work among bank supervisors from all over the world.

While much of the work on international supervisory co-operation has taken place under the aegis of the Bank for International Settlements and the Cooke Committee, other bodies have been playing a role in this area. The Committee on Financial Markets of the Organization for Economic Co-operation and Development affords the opportunity for central bankers, finance ministry officials, bank supervisors, and banks to meet and discuss common concerns. This Committee has also set up an Expert Group on Banking to assist in the preparation of a series of studies covering among other subjects, the scope of prudential supervision in major industrial countries.

Within the European Community harmonization of banking supervision is viewed as one element in the creation of a common market in banking as envisaged in the Treaty of Rome. The First Banking Co-ordination Directive adopted in 1977 provides for minimum authorization criteria, the calculation of common prudential ratios (which in the first instance are for observation purposes only) and the establishment of an Advisory Banking Committee to assist the EEC Commission in its co-ordination work. As a follow-up to the 1977 Directive the EEC Commission has recently drafted proposals for the standardization of banks' annual accounts, the supervision of banks on a consolidated basis and the co-ordination of winding up procedures. At the same time the Advisory Banking Committee has introduced a series of observation ratios covering solvency, liquidity and profitability which are currently being applied on a trial basis.

The Advisory Banking Committee is a high-level policy-making committee consisting of not more than three representatives from each member state and from the EEC Commission. It meets usually twice a year in Brussels and is backed by a secretariat provided by the EEC Commission. The Committee works alongside the Commission and lays down general policy guidelines relating to supervisory co-ordination within the European Community.

The EEC Commission and the Advisory Banking Group are supported in their co-ordination work by an informal club of member state

supervisory authorities known as the Contact Group. This Group was established in 1971 in order to provide national supervisors with a forum for the free exchange of views and an opportunity to develop an understanding of each others' regulatory systems. The Group continues to fulfil these functions but in addition, undertakes detailed technical studies which may, after transmission to the Advisory Banking Group or the EEC Commission, provide a basis for formal harmonization proposals. The Contact Group also frequently submits its papers to the Cooke Committee with which it maintains a close working relationship.

II. Overview of National Regulatory Arrangements

National authorities use a variety of approaches and controls to foster bank safety and soundness, and to maintain confidence in the banking system as a whole. The techniques employed may be broadly categorized into preventive regulation designed to limit risks incurred by banks; schemes which offer protection to depositors in the event of bank failure; and support provided by national monetary authorities to banks experiencing liquidity difficulties (the lender of last resort function).

A. Preventive Regulation

Among measures aimed at controlling the levels of risk incurred by banks are those concerned with market entry, capital and liquidity adequacy, permissible business activities, foreign currency exposure, concentration of loans and country risk exposure.

1. Market Entry

In virtually all national banking systems regulation begins at the market entry stage. Before they can be authorized banks must satisfy various requirements which typically include a reputable management and some minimum amount of subscribed capital, the capital requirement, where formalized, varying from the equivalent of US$200,000 (Netherlands) to nearly US$10million (UK). For both competitive and prudential reasons branches of foreign banks must generally possess a specified amount of endowment capital, although the UK imposes no such requirement, while Hong Kong has introduced a minimum assets criterion for foreign banks seeking to establish local branches. Several countries apply an economic need criterion and in such cases market entry may be restricted or (as in Italy and Hong Kong) suspended from time to time with a view to curbing excessive and destabilizing competition. In financial centers such as Singapore, where domestic and off-

shore banking operations are separated, entry controls may allow a greater degree of competition in the offshore market than is permitted domestically.

Entry of foreign-owned banks may be formally limited to subsidiaries (as in Canada) on the grounds that locally incorporated entities can be more effectively regulated by the host authority. In contrast, some other countries (Japan, Hong Kong, Singapore) have preferred to confine full banking status to branches rather than subsidiaries of foreign banks, because a branch is considered to enjoy the full support of the group to which it belongs.

It is also the practice of a number of countries (Canada, the UK, Hong Kong and Singapore) to request letters of comfort from foreign banks wishing to establish local financial subsidiaries. Although not generally considered to be legally binding, these letters are in some instances being requested in a form which the banks concerned believe to have the force of law. A few countries (Hong Kong, Singapore) adjust their prudential requirements according to whether or not a letter of comfort has been obtained, while others (France, Belgium) are prepared to waive certain solvency or liquidity requirements where a specific guarantee has been received from the foreign parent bank. German subsidiaries of foreign banks may have to provide binding letters of indemnification from their parent institutions in respect of any payments that may be made by the German Deposit Protection Fund to the subsidiary's depositors. While Italy appears to be unique in requiring Italian branches of foreign banks to produce a formal declaration from their head office stating that, under its own law, the head office is liable to the full-extent of its assets for the liabilities of its foreign branch.

2. Capital Adequacy

In addition to a minimum capital requirement, banks are generally required to maintain an appropriate relationship between capital on the one hand and total assets, risk assets or liabilities on the other. However, some countries (Hong Kong, Italy, Japan, Canada) do not formally regulate capital adequacy, others (including the United States) make an essentially judgmental assessment while most European countries apply solvency ratios of varying complexity which incorporate different weightings for different categories of risk asset. In this last case, the weightings applied to similar categories of asset may vary. For instance, whereas Switzerland applies a premium weighting to all foreign assets, the Netherlands at present accords a preferential zero weighting to loans to foreign banks and governments (though the position here may change shortly). In addition, one country (Belgium) applies a solvency

ratio which discriminates in favor of larger banks on the grounds that small banks are more risky. The United Kingdom calculates both a gearing and a risk assets ratio but does not apply a general norm to all or any class of banks.

Definitions of capital differ, particularly in the treatment of subordinated debt. A few countries such as Germany exclude subordinated debt altogether, others include it up to a limit that varies between 10 per cent and 50 per cent of total capital while the US federal supervisory agencies have a divided approach to this question. Because of the variety of methods used in capital adequacy assessment, it is not possible to make direct comparisons between requirements in different countries. Nevertheless, where capital adequacy guidelines are or can be expressed in terms of a gearing ratio (whose precise definition may vary) this can range between: 50x for a foreign-owned merchant bank in Singapore with a letter of comfort from its parent, 33x for Luxembourg banks, 30x for the larger Canadian domestic banks, 20x for a foreign-owned Canadian bank and 15x for a foreign-owned consortium bank in Singapore. The maximum gearing guideline for non-multinational US domestic banks supervised by the Comptroller of the Currency or the Federal Reserve is 14x to 20x depending on the category of bank and the definition of capital used. US multinational banks are not at present subject to a norm but they are expected to reduce their gearing over a period of time towards the levels permissible for non-multinational US banks.

Where, on the other hand, capital adequacy is assessed against risk assets rather than total assets the indicated norm ranges between 10% (Netherlands) and 5% (France, Belgium). It should, however be stressed that exemptions, special risk categories and different definitions of capital make direct comparisons hazardous.

Capital adequacy may or may not be assessed on a world-wide consolidated basis, although the general trend is towards consolidation as indicated by recent moves in this direction by Switzerland, Germany and Belgium. Even so, the treatment for consolidation purposes of non-wholly owned subsidiaries and minority interests may differ. In general, host countries monitor and regulate the capital adequacy of foreign banks' local subsidiaries. Some host countries also treat branches of foreign banks as separate entities for capital adequacy purposes, although this may reflect competitive rather than prudential concerns.

3. Liquidity Control

As with capital adequacy, approaches to the measurement and control of liquidity vary considerably. Some countries (including the United

States and Canada) choose not to lay down formal prudential liquidity requirements while others (notably the Netherlands, Germany and Switzerland) apply a number of ratios designed to limit the extent of maturity mismatching in banks' balance sheets. In a few cases (for instance France and Italy) banks which accept short-term deposits are regulated separately from those engaging in longer term banking business and special limits may be placed on their term lending. Where regulation is formalized, distinctions may or may not be drawn on the assets side between primary, secondary and other classes of liquidity and on the liabilities side between interest-sensitive money market funds and retail deposits. Although most national schemes seek to classify liabilities both by maturity and volatility with a view to determining the extent to which funds may prudently be used as a basis for maturity transformation, direct comparisons of permissible transformation are not possible because of the variety of assessment methods and other institutional differences. In general, liquidity regulation does not take account of undue deposit concentrations, although the Netherlands imposes extra liquidity requirements on "large item" liabilities and the United Kingdom requires deposit concentrations of 5% or more to be reported quarterly.

It is generally recognized that the management of foreign currency liquidity may present special problems in so far as banks lack direct access to the lender of last resort in that currency. On the other hand, there is no common approach to the treatment of foreign currency items for liquidity purposes. Some financial centers such as Singapore specifically exempt banks' foreign currency operations from the liquidity requirements that apply to local currency business. Others such as Hong Kong apply liquidity norms uniformly to local and foreign currency items. Japan pays particular attention to Japanese banks' Euro-currency activities which are subject to a special mismatch limit. France requires separate calculations for local and foreign currency liquidity while Germany applies limits to foreign exchange exposure which serve the additional purpose of limiting maturity mis-matching in foreign currencies. More typically, however, foreign currency business is not subject to liquidity rules or guidelines.

Some countries (notably the United States) assess liquidity on a world-wide consolidated basis, some (such as Japan) include foreign branches but not subsidiaries in the assessment process, while others (for instance France) confine their regular assessments to banks' domestic offices. Branches of foreign banks may or may not be assessed for liquidity by the host authority.

4. *Permissible Business Activities*

Typically, banks are limited as to the kinds of business they can engage in, although such restrictions may in part reflect non-prudential concerns such as potential conflicts of interest or undue concentrations of economic power. There is no generally accepted view as to what is and what is not legitimate banking business. Some countries (notably the United States, Canada and Japan) formally separate commercial from investment banking and prohibit commercial banks from underwriting equities. Restrictions are more often imposed on banks' investments in property and also on equity holdings in non-bank companies. In the latter case limits may be expressed both as a percentage of the lending bank's capital, the ceiling here varying between 100% (France) and 25% (Hong Kong), and/or as a percentage of the non-bank company's equity, with the maximum holding ranging from 2% (Italy) to 20% (France).

Several countries prohibit the mixing of banking and non-banking business within the bank entity while permitting participation in at least some kinds of non-banking activity through bank holding companies, subsidiaries and/or minority interests. Other countries (such as the Netherlands) permit the bank entity itself to engage directly in non-banking business but limit the scope for investment in non-bank companies. A third approach (illustrated by France) permits a wider range of activities to be undertaken by a special category of separately regulated universal banks. Finally, some countries (such as the United Kingdom, Switzerland and Germany) impose few formal restrictions on the kinds of business banks may engage in, whether directly or through affiliates, although these countries typically impose heavy risk weightings on certain kinds of business activity for the purpose of calculating solvency requirements.

In the case of international operations, restrictions may be relaxed so as to enable foreign offices of domestic banks to compete more equally in their country of residence with local banks. Alternatively, where the home authority imposes no authorization requirements or other controls on banks' foreign establishments, the host jurisdiction alone determines the extent of permissible activities.

5. *Loan Concentration and Country Risk*

Most supervisory authorities seek to limit risk concentrations by imposing formal or informal limits on each banks' loans to a single borrower. Stated as a percentage of the lending bank's capital, the limits vary between 100% (Italy) and 10% (the United States), subject to varying definitions of capital for this purpose. These limits may or may not

be applied on a consolidated basis and branches of foreign banks may or may not be separately assessed (several countries, for instance, look to group rather than branch capital in this context).

In general, lending limits to individual borrowers are not applied to country risk exposure involving several borrowing entities from the same country. The United States is, however, an exception in that its 10% statutory lending limit has been interpreted to apply collectively to loans to foreign governments, their agencies and instrumentalities unless a) the borrower has an independent source of repayment and b) the loan is to be used for the borrower's business. The United States approach to country risk is also distinctive in that federal regulators categorize countries into three risk classes for the purpose of determining prudent lending limits for each country beyond which a bank's loans may be 'listed' or subject to comment. Few other authorities claim to take an independent view of individual countries' financial prospects, although the United Kingdom does make such an assessment. More generally, supervision of country risk is influenced by the fact that regulators are often reluctant to be seen to challenge the judgement of commercial bankers in an area which can also give rise to political difficulties.

On the other hand, most countries do attempt to measure and monitor their banks' country risk exposure. Sometimes (as in the United States and United Kingdom) this is done on the basis of world-wide consolidated data, embracing cross-border and non-local currency loans to foreign borrowers adjusted for third party guarantees. In other cases (for instance Italy, France, Germany, and Japan) exposure data is not fully consolidated while risk transfers via third party guarantees are generally ignored. Some countries (for instance Hong Kong) which collect consolidated country exposure data largely for BIS purposes do not use it as a basis for prudential supervision. The consolidation issue apart, there is some uncertainty about the appropriate measurement of country risk, as when a commercial borrower has an independent source of hard currency repayment outside the jurisdiction of the country in which it is based. Furthermore, there is concern that even local currency lending to foreign borrowers may give rise to country risk.

Several countries (notably Germany, Switzerland and Belgium) require banks to report their methods of country risk evaluation. On the other hand, not all authorities to whom such reports are made have developed a procedure for assessing the adequacy or otherwise of such evaluation techniques. There appears to be a division here, too, between those regulators who feel they have a duty to screen banks' country risk evaluation methods and those who wish merely to alert banks to the need for country risk assessment.

While country risk is now among the foremost supervisory concerns, regulators have not attempted to impose an absolute limit on total country risk exposure but instead focus on the need for diversification. Switzerland comes nearest to an aggregative approach in applying a special premium capital requirement to banks' foreign assets. In contrast, some other countries apply a preferentially low capital requirement to loans to foreign governments.

6. Foreign Currency Exposure

In the area of foreign exchange risk, most countries monitor banks' exposure and seek to ensure adequate internal control procedures, but there are marked differences in regulatory procedures. Some countries (including the United States, Canada and France) prefer to avoid general limits or norms, others (such as the Netherlands and Switzerland) apply incremental capital requirements to uncovered positions, while a third group (including the United Kingdom and Germany) imposes guidelines or formal limits on aggregate, and in some cases, individual foreign currency positions. Singapore has recently discontinued regular prudential returns relating to foreign currency exposure, relying instead on spot checks during the bank examination process.

Where exposure limits are indicated, they are generally stated as a percentage of capital, although Japan places limits on each bank based in part on the volume of foreign exchange transactions. The United Kingdom has an exposure guideline for all currencies together equal to 15% of capital. Since this is expressed as an aggregate net short position (rather than a combined net long and short position) it is equivalent for most purposes to Germany's 30% of capital limit which relates to the difference between a bank's foreign currency assets and liabilities. However, because the UK guideline embraces sterling whereas Germany's excludes Deutschemark items, German banks have twice the latitude of UK banks when taking long or short positions in their local currency.

Few countries (the United States being an exception) monitor or regulate foreign currency exposure on a consolidated basis. Most countries exclude foreign subsidiaries, some exclude foreign branches and the treatment of local branches of foreign banks also varies.

7. Bank Inspection

The role of bank inspections in the regulatory process varies considerably from country to country. At one end of the spectrum is the United States where regular on-site examinations lie at the heart of the supervisory system and whose examiners are required to provide a composite rating of each bank on a standardized basis. At the other end of

the spectrum is the United Kingdom which eschews bank inspections in favor of a surveillance system based on interviews with management backed by extensive reported data. Routine on-site bank examinations, where they occur, may be conducted by the supervisory authorities' own inspectorate (as in the United States, Canada, Italy, France and Japan), special auditors appointed and paid for by the authorities (Belgium), auditors licensed by the authorities and subject to special statutory duties (Switzerland) or general auditors (Germany). Examinations may take place annually (as in Canada), every 3-4 years (Italy) or at intervals varying between 1 to 2 and 10 years depending on the size and standing of the institution concerned (France). Several countries confine on-site examinations to banks' head offices while others (such as Japan) make a random selection of branches for inspection purposes.

The principle of parental responsibility dictates that home country supervisors should have access to information about banks' foreign establishments. Few countries, however, conduct examinations of foreign branches or subsidiaries, although the United States aims to do so routinely (the Comptroller of the Currency has a permanent office in London for this purpose) while Japan and Germany also carry out periodic examinations of foreign branches. On the other hand, several countries, notably Luxembourg, Singapore and Switzerland, do not allow access to foreign inspectors and in these cases, too, bank secrecy laws limit the flow of information both between host and home authorities and between foreign-owned banks and their parent institutions. Furthermore, France, which previously allowed access to US inspectors, is no longer able to do so because of new legislation protecting commercial information. In the context of current EEC initiatives in this area it is evident, too, that some countries are reluctant to establish a formal right of access to foreign inspectors.

B. Deposit Insurance

Most countries either have or are in the process of introducing deposit protection schemes. These may be official (as in Canada, the United Kingdom and the United States), organized by the banking industry itself with the encouragement of the authorities (as in France, Germany and the Netherlands) or jointly administered by the authorities and the banks (as in Belgium and Japan). In general, participation is mandatory although not every bank is a member of the German scheme and foreign banks having equivalent coverage from home-based schemes may be exempted. Countries which do not have any formal deposit protection arrangements include Hong Kong, Italy, Luxembourg and Singapore.

Typically, the protection offered is territorial in scope, thereby embracing branches and subsidiaries of foreign banks and excluding deposits with foreign offices of domestic banks. However, there are exceptions: the German and Japanese schemes cover foreign branches of domestic banks while the Belgian and Japanese schemes exclude local branches of foreign banks. All schemes cover both residents' and non-residents' deposits but there is an even split between those that protect foreign currency deposits (Belgium, Germany, the Netherlands and the United States) and those which do not (Canada, France, Japan and the UK). Most schemes exclude inter-bank deposits (Canada being an exception) while certain categories of term deposits as well as certificates of deposit may also be excluded.

In all cases there is a maximum amount per depositor per institution beyond which protection is not provided, the rationale here being that large depositors are in a better position to assess bank risk than small depositors. The deposit ceilings range from the equivalent of US$13,000 (Japan) to US$100,000 (United States), although Germany is unusual in imposing a limit equal to 30% of the failed bank's state equity capital while Belgium applies a discretionary deposit cut-off point (an approach that has recently been challenged in the Belgian courts). Also exceptional are the United Kingdom and (proposed) Swiss schemes which require the depositor to bear some proportion of any loss, the purpose and effect here being to provide a limited form of consumer protection rather than to prevent precautionary deposit withdrawals.

The United States is unique in that its deposit protection agency has broad powers which can be used to assist or merge troubled banks and thereby avoid deposit pay-offs. Reflecting the agency's active use of these powers and its long-established aversion to deposit pay-offs, 99.9% of all depositors with failed US banks recovered the full amount of their deposits in the period 1934-1980. To this extent the $100,000 cut-off point for US deposit protection is largely redundant.

Most deposit protection arrangements are insurance schemes proper in the sense that depositors have a legal right to be paid off. However, the German scheme is discretionary and there is some doubt also about the Belgian scheme's status from this point of view. Furthermore, there are wide differences in funding arrangments and in the capacity to make large-scale deposit pay-offs. Some schemes (as in France and the Netherlands) are unfunded and rely wholly or largely on ad hoc levies on participant banks to cover deposit losses as they occur. In the case of funded schemes the size of established funds varies between just over 1% of insured deposits (United States) and 0.035% of insured deposits (Japan), although most funds can be supplemented by official borrow-

ing. Contributions to funded and unfunded schemes are typically flat-rate and calculated on the basis of each bank's total deposits. France, however, provides for a graduated scale of contributions which discriminates in favor of larger banks on the grounds that they are less risky.

C. Lender of Last Resort/Emergency Measures

In general, national monetary authorities are prepared to provide financial assistance to commercial banks experiencing temporary liquidity difficulties. A distinction can, however, usually be drawn between routine use of the official discount window, where conditions of access are often formalized, and longer-term support operations undertaken on a discretionary basis.

Although emergency assistance is typically extended directly by the central bank at a penal interest rate, there are alternative methods of support. In Belgium and Germany, for instance, funds are channelled through a special facility jointly established by the authorities and the commercial banks. The Bank of Italy's practice is to lend at below market rates to institutions prepared to acquire/assist the problem bank — an approach also employed on occasion by the US deposit insurance agency. More generally, support may be provided, with or without official encouragement, by one or more large domestic banks: the Hong Kong and Shanghai Bank has fulfilled this function in Hong Kong, as has the Bank of Tokyo in Japan (in respect of foreign currency liquidity), and the UK clearing banks were involved in large-scale emergency assistance during the UK secondary banking crisis of 1973-75.

Some financial centers, notably Luxembourg, Hong Kong and Singapore, have no indigenous central banks in the conventional sense. In Luxembourg there is no lender of last resort capacity, in Hong Kong the Government's Exchange Fund is available for this purpose while the Monetary Authority of Singapore has a statutory power to provide liquidity assistance.

Frequently, emergency support can be offered only on a secured basis to solvent institutions, although solvency in this context may not be easily determined. Some countries (for instance, Belgium and the United Kingdom) have broader powers of intervention where insolvency is threatened, while in other cases (as in Canada and the United States) the deposit insurance agency has lender of last resort powers which, at least in respect of potentially insolvent institutions, may exceed those of the central bank. Some central banks are disposed to act as the lender of last resort in domestic currency only, although such funds may in princi-

ple be converted if the recipient bank's need is for foreign currency liquidity. Elsewhere the capacity to provide foreign currency assistance is limited by the size of official reserves relative to the volume of locally placed foreign currency deposits.

As a matter of policy, and in order to discourage excessive risk-taking by banks, the precise scope of the lender of last resort function is not publicly stated. This calculated reticence applies both to the circumstances in which assistance may be given and to the allocation of support responsibilities between different national authorities. In several countries (for instance, Japan and the United States) foreign banks have a formalized right of access to the central bank's discount window but it is not clear that this facility would extend to emergency support. In general, national authorities expect foreign parent banks to provide all necessary assistance to their local subsidiaries whether or not letters of comfort have been issued, although the threat of shareholders' actions could in theory place a limit on this commitment. So far as branches are concerned, the US authorities have in the past demonstrated a willingness to provide emergency support to the foreign branch of a US bank, using the head office as a conduit for such assistance.

Among other emergency measures that may be available to avert sudden bank failures are assisted mergers and the appointment of caretaker managers to troubled banks. Furthermore, as indicated above, financial centers frequently look to parent institutions to support foreign-owned banks to whom they are host, for which purpose irrevocable lines of credit and/or letters of comfort may be required or encouraged. Letters of comfort may also serve the purpose of alerting foreign central banks to potential demands for liquidity assistance originating from abroad, particularly where (as for instance in Hong Kong) such letters are required to be issued with the full knowledge of the parent institution's supervisory authority.

Finally, where banks do fail the ensuing liquidation proceedings may be specially designed to protect local depositors. For this purpose several countries treat branches of foreign banks as separate entities requiring their own liquidation and in such cases, too, branch creditors may enjoy a preferential claim to branch assets (as in the Netherlands and Singapore and also under New York State law).

III. Country Surveys

A. Belgium

The Commission Bancaire (CB) is the body responsible for supervising the Belgian banking system. Although the CB has broad statutory powers to lay down prudential regulations it has preferred to adopt a less formal approach. Accordingly, only banks' capital adequacy is governed by formal prudential ratios. The CB also has authority to supervise banks' international operations on a consolidated basis, but is currently seeking to achieve this result on the basis of gentleman's agreements. The CB's functions are confined largely to preventive regulation/supervision, emergency assistance and deposit protection being the province of a separately constituted public body, the Institut de Réescompte et de Garantie (IRG).

1. Entry Controls

Banks are required to register with the CB before they can undertake operations. Registration is only effected when the CB is satisfied that the following criteria for authorization have been satisfied: (1) appropriate legal form (a bank must be a société commerciale, thereby excluding one-man firms); (2) a minimum capital of 50 million francs; and (3) a reputable and competent management. Branches of foreign banks are subject to the same authorization requirements, the branches' capital endowment being for this purpose defined as capital funds permanently allocated to the branch for its activities in Belgium.

2. Capital Adequacy

The solvency regulation stipulates that a bank's holdings of fixed assets should not exceed its capital and reserves. The regulation also applies a capital/risk assets test which (for prudential reasons) favors larger against smaller banks while requiring higher capital cover both for risky assets and for high concentrations of risk exposure to individual borrowers.

The capital/risk assets test involves three steps. Firstly, a bank's total risk quotient is calculated by aggregating the specified solvency requirements applicable to different categories of asset. For this purpose risk-bearing assets are in general subject to a 5% capital requirement with an additional 2.5% demanded where loans to individual borrowers exceed 20% of capital; inter-bank loans attract a lower requirement of 1%; and certain public sector loans (including those to member states of the EEC) are exempt. Secondly, the first and subsequent Fr10 million tran-

ches of the total risk quotient are adjusted upwards by Fr10 million and Fr5 million, respectively, the purpose and effect of this being to impose higher capital ratios on smaller banks. Finally, those assets (notably participations of over 10%) requiring 100% capital backing, having been excluded from the original risk quotient calculation, are added to the adjusted risk quotient to arrive at a bank's total capital requirement.

Capital is defined as the sum of equity capital, reserves (published and hidden), retained earnings and general provisions. In addition, the CB may, at its discretion and subject to certain restrictive conditions, include subordinated debt up to a limit of 50% of total capital. As an exception to the general capital adequacy rules the CB may grant a concession to foreign banks' branches in Belgium and to their subsidiaries enjoying a parent bank guarantee whereby the ratios are applied to their Belgian business alone and not to their international business. The CB is in the process of applying the solvency regulation on a consolidated basis and in February 1982 issued two circulars to this effect.

3. Liquidity Control

In contrast to the detailed requirements relating to capital adequacy, liquidity is not formally regulated although the CB has the statutory authority to do so. Liquidity is monitored through the banks' normal statistical returns as well as through auditor's assessments. No precise definition of what constitutes sufficient liquidity has been formulated.

4. Permissible Business Activities

The only statutory restrictions on the kinds of business banks can undertake relate to their equity investments. In general banks are prohibited from holding shares in non-bank companies but this so-called law against universal banks has been relaxed in recent years. In particular, banks may now hold shares in connection with their underwriting business while the CB is authorized to allow investments in bank-related businesses such as leasing, factoring and data processing.

5. Foreign Currency Exposure

The CB is authorized to issue regulations establishing limits for foreign exchange exposure but has so far declined to do so. The solvency regulation imposes a 0.2% capital requirement on total claims arising from forward foreign exchange transactions but there is no requirement relating to uncovered positions, whether spot or forward. Nevertheless, banks are subject to extensive reporting requirements on their foreign exchange exposure and the CB, through bank auditors, seeks to ensure that each bank's internal controls are fully adequate.

6. Loan Concentrations and Country Risk

Loans to individual customers exceeding 20% of the lending bank's capital are required by the solvency regulation to be backed by additional capital (above). The CB also has statutory authority to formulate and apply loan limits. To date it has not issued regulations in this area but it has as a matter of practice recommended certain banks to reduce their loans to single borrowers in cases where the loans exceeded 50% of the banks' capital.

There are no formal limits on country risk exposure. However, the authorities collect and monitor data on country risk and, since November 1980, have also required bank auditors to report on each bank's approach to country risk evaluation.

7. Bank Examination

Under Belgian law bank auditors play a special role in the supervisory process. They are appointed and paid for by the CB, and their statutory functions go well beyond the verification of the annual accounts: for instance, they must satisfy themselves of each bank's compliance with the regulations and must also monitor the bank's solvency and liquidity position. While reliance is placed on bank auditors for routine supervision purposes the CB maintains its own inspectorate which is used for on-the-spot checks, usually in special circumstances.

8. Deposit Protection and Lender of Last Resort

The Institut de Réescompte et de Garantie (IRG), a public body funded by the commercial banks and jointly administered by them and the Government, offers both deposit protection and emergency liquidity assistance. In its deposit protection role the IRG has a broad discretion (but no obligation) to pay off all creditors of a failed bank, the current practice being to impose a ceiling on the amount payable to each depositor which may vary from case to case. The IRG has not so far redeemed any foreign currency deposits but is empowered to do so. Belgian subsidiaries, but not branches, of foreign banks participate in the scheme.

In its liquidity assistance role the IRG again has wide discretionary powers. In particular support may be given to potentially insolvent institutions while funds advanced need not always be fully secured, the guiding principle being whether intervention is necessary in the public interest. Liquidity assistance may be given to foreign branches, but not subsidiaries, of Belgian banks. Participation in the scheme does not imply a right to intervention either in the bank's favor or in favor of its creditors/depositors.

The IRG's resources are based on the BF1 billion of equity capital subscribed by the commercial banks, money market borrowings, borrowings from the National Bank of Belgium, and a special intervention reserve of BF3 billion also subscribed by the banks. Bank subscriptions are proportionate to their balance sheet totals and their participation in the scheme is subject to renewal every five years.

The National Bank of Belgium continues to provide routine liquidity assistance through its discount window and may also be viewed as the lender of last resort although it has not been called upon to exercise this function since the Second World War.

B. Canada

The Office of the Inspector General of Banks (OIB), as the agency responsible to the Minister of Finance for the administration of the Bank Act, is charged with supervision of the banking system. The OIB must report to the Minister at least once a year on the financial soundness of each bank and advise the Minister on applications for the incorporation of banks.

The OIB's traditional approach to supervision has been characterized by informality, bilateral discussions and an absence of regulations and directives. However, the latest decennial revision of the Bank Act that came into force at the end of 1980, in providing for the chartering of foreign banks, will increase the number of federally supervised banks from 12 to around 70. Accordingly the new Act authorizes the issuance of regulations on capital adequacy and liquidity, as well as directives to individual banks, should the need arise. It remains to be seen whether changed circumstances will oblige the authorities to resort to such formal controls in due course.

The new Bank Act for the first time provides for the chartering of foreign bank subsidiaries, while continuing to prohibit the establishment of branches of foreign banks. Foreign owned banks will, nevertheless, face important constraints on their expansion: individually their domestic assets must not exceed 20 times deemed authorized capital (changes in which can be made at the discretion of the authorities) and collectively their domestic assets must not exceed 8% of the total domestic assets of all banks in Canada.

The revised Act also provides for the incorporation of two classes of banks: Schedule A banks, whose shares are widely held, and Schedule B banks (including foreign bank subsidiaries) whose shares are closely held.

1. Entry Controls

No bank can commence business without the approval of the authorities although only foreign bank subsidiaries are subject to formal licensing requirements. The criteria applied in considering approvals include capital adequacy (generally over and above the statutory minima for authorized capital set out in the Bank Act) and a reputable and experienced management. Foreign banks wishing to establish Canadian subsidiaries must meet additional statutory and non-statutory criteria, notably: (1) the potential to make a contribution to competitive banking in Canada: (2) reciprocity for Canadian banks in the home jurisdiction; (3) a certificate of good standing from the home jurisdiction; (4) a favorable earnings record over the last five years; (5) adequate supervision by the home supervisory authority; and (6) a letter of comfort with regard to the proposed subsidiary.

There are no domestically imposed branching constraints on Canadian banks either at home or abroad.

2. Capital Adequacy

The new Bank Act requires every bank to maintain adequate capital in relation to its operations and to comply with any regulations or directives that may be issued in this connection. In practice, the authorities have continued to avoid formal regulation and rely instead on broad guidelines which focus on banks' leverage ratios (the ratio of total assets to equity capital and reserves). De facto leverage ratios have been rising over a long period and currently vary between 17x and 36x, but guidance has recently been given to the effect that the appropriate maximum ratio for the largest banks is 30x and for the smaller banks 20-25x.

Foreign bank subsidiaries are expected to conform to a maximum leverage ratio of 20x, which is additional to the statutory leverage constraint relating to authorized not actual capital (this having a competitive rather than a prudential function). As from November, 1981 leverage ratios have been calculated on a consolidated basis.

Banks are subject to a statutory prohibition on annual dividend payments which exceed 8% of their paid-in capital unless the general reserve plus retained earnings amount to at least 20% of paid-in capital and contributed surplus. This provision may be viewed as a means of promoting capital growth.

3. Liquidity Control

As in the case of capital adequacy, the Bank Act requires every bank to maintain adequate and appropriate forms of liquidity, with parallel

provision for the issuance of regulations and directives. To date neither regulations nor informal guidelines have been utilized, although liquidity is reviewed regularly as part of the bank examination process. Particular attention is currently being given to the question of maturity-mismatching, although internal studies show that Canadian banks typically engage in reverse interest rate mis-matching in the sense that liabilities tend to respond to interest rate changes with a greater lag than do assets.

4. Permissible Business Activities

The revised Bank Act sets out the powers of banks while also specifying certain restrictions on their activities. Subject to certain limited exceptions banks may not own more than 10% of the voting shares of any Canadian company; they cannot undertake insurance business, fiduciary activities or underwrite equities; and there are various restrictions on their dealings in securities and property holdings. However, the Act does permit banks to engage in factoring and leasing through wholly owned subsidiaries.

The limitations on Canadian banks' activities apply equally to their international operations.

5. Foreign Currency Exposure

There are no formal limits or informal guidelines relating to banks' foreign exchange exposure. On the other hand the authorities attach considerable importance to internal management controls (the OIB has carried out special inspections of control procedures in the big six Canadian banks); banks must submit their currency exposure limits as agreed by their respective Boards; and de facto exposure amounting in aggregate to over, say, 10% of capital would be a matter for official concern.

6. Loan Concentrations and Country Risk

There are no formal limits on the size of loan which a bank may extend to a single borrower and traditionally banks have attempted to meet the entire borrowing requirements of their customers. Equally, country exposures are not subject to any official ceiling although the authorities obtain consolidated exposure data each quarter and banks are expected to justify their country risk evaluation procedures. In addition, reliance is placed on the auditors' assessment of the foreign loan portfolio. The authorities themselves do not form an independent view of the credit standing of individual countries.

7. *Bank Examination*

The OIB has a statutory duty to inspect banks annually to ensure that the provisions of the Act relating to the safety of the creditors and shareholders are being observed and that the banks are in a sound financial condition. Each on-site inspection typically involves three examiners for a period of 2-4 days, with particular attention being given to the quality of loans. Inspections are confined to the bank's head office where all relevant information relating to branches and subsidiaries is expected to be maintained. Accordingly, inspections do not extend to domestic banks' establishments abroad. Bank examinations, together with quarterly statistical returns, form the basis of the supervisory process.

8. *Deposit Insurance*

Banks as well as federally incorporated trust and mortgage loan companies must become members of the Canada Deposit Insurance Corporation (CDIC). Insurance is limited to C$20,000 per depositor per institution (the ceiling is now under review) and the deposits must be made with an office located in Canada and denominated in Canadian dollars. Coverage extends to non-residents and to corporate and bank depositors. The CDIC is funded by an annual levy on member institutions although it also has powers to borrow from the Federal Government. The fund currently amounts to approximately 0.2% of insured deposits.

As part of its deposit protection function the CDIC has broad powers to acquire assets from and make secured or unsecured advances to member institutions for the purpose of reducing prospective losses to the Corporation.

9. *Lender of Last Resort and Emergency Measures*

The Bank of Canada Act confers on the Bank of Canada broad powers as lender of last resort. All loans must be made on a secured basis although the revised Bank Act has substantially broadened the range of eligible collateral for this purpose. The Bank of Canada recently formalized the terms on which it will lend as follows:

Lines of credit are extended by the central bank to each chartered bank and to each member of the Canadian Payments Association that participates directly in the daily clearing of payments' items and maintains an account at the Bank of Canada for this purpose. The lines of credit for each institution are the greater of: (a) 2½% of its checkable deposits; (b) 10% of its average primary reserve requirement; and (c) C$1 million.

"Ordinary" advances by the Bank of Canada shall not exceed the institution's line of credit; the advance is for one business day; there are restrictions on the frequency of drawings; the rate charged is Bank Rate; and collateral consists of securities issued or guaranteed by Canada or a province of Canada.

"Extraordinary" advances are advances that do not meet these conditions, for instance because the line of credit is exceeded, the term is for longer than one business day or the security is otherwise than above. In such cases the rate charged will normally be above the Bank Rate.

The CDIC also has a lender of last resort function (above). This was recently exercised in the case of the Astra Trust Company which, however, was eventually liquidated in July 1980. Due partly to the high level of industry concentration there has been no bank failure since 1923.

Foreign banks are required to provide non-legally binding letters of comfort covering their Canadian bank subsidiaries. The Canadian authorities would accordingly look first to the parent institution for support in the event that a foreign bank subsidiary experienced liquidity difficulties going beyond unexpected clearing swings.

C. France

Supervision of the French banking system is complicated by a multiplicity of regulatory bodies as well as by various categories of banking institution. The Treasury and the Bank of France, together with the Conseil National du Crédit (CNC) and the Commission de Controle des Banques (CCB), are charged with responsibility for regulating commercial banks although since the Bank of France provides the secretariat both of the CNC and the CCB it has in practice a pre-eminent role in day-to-day supervisory matters. The Association Française des Banques (AFB), being the key link between the authorities and the banks, also has a formal role to play in the supervisory process.

The commercial banks are legally categorized into deposit banks, investment banks and medium and long-term credit banks. However, restrictions on the permissible activities of each type of institution (for instance the extent to which investment banks must rely on term rather than sight deposits) have been eased in recent years and the functional distinctions have become correspondingly less important. The co-operative, savings and other specialized banks falling outside the commercial banking sector are subject to separate regulatory arrangements.

The nationalization bill will leave about 10% of the commercial banks' deposit business in the private sector. This legislation apart, the

Government plans to introduce a new banking law in 1982 whose scope has yet to be determined, but which will aim to rationalize the complex structure of the domestic banking industry.

1. Entry Controls

All commercial banks must be authorized by the CNC. The authorization requirements include: (a) minimum capital, the amount of which depends on the bank's legal form, the number of branches and its balance sheet total; (b) a reputable management; and (c) a judgement by the CNC that the application is justified by general and local economic needs (in practice rarely invoked as a reason for refusing authorization). These criteria apply equally to foreign banks seeking to establish branches or subsidiaries in France. French banks establishing branches abroad do not require the prior authorization of the CNC.

2. Capital Adequacy

A new solvency regulation was introduced in 1979 and this is currently being operated by the CCB on an experimental basis. The regulation establishes a risk assets/capital ratio target of 5% which banks are required to move towards in specified stages. For this purpose assets are accorded different weightings depending on their risk category: for instance, ordinary advances, including loans to foreign governments, are accorded a weighting of 100%, inter-bank loans are subject to a weighting of 5% and loans to or guaranteed by the French government and certain public sector bodies are given a zero weighting.

Capital is defined to include share capital, reserves, general provisions and (to a theoretically unlimited extent) subordinated debt, with a deduction for investments in banking subsidiaries and affiliates. There is no mandatory consolidation for the purpose of calculating the solvency ratio, although banks may be assessed on this basis if they so choose. French branches of foreign banks may be exempted from the solvency ratio requirement on condition that (a) solvency is adequately regulated in the country of origin and (b) the parent bank gives a formal guarantee to support its French branch.

3. Liquidity Control

The CCB has introducted two liquidity ratio requirements under its statutory authority to regulate banks. The first relates liquid assets (defined to include cash, inter-bank deposits of under three months' maturity, rediscountable paper and various marketable securities) to short-term liabilities (liabilities at sight and due within three months) and specifies that, in the case of investment and deposit banks, liquid assets

must at all times equal at least 60% of short-term liabilities. The second requirement, which applies to all commercial banks, relates certain medium and long-term loans to capital plus savings accounts (essentially deposits with over three months to maturity) and specifies that if the former exceeds the latter by a factor of more than three, then an alternative liquidity rule must be met. This in turn specifies that 80% of medium and long-term loans must be covered by capital plus savings accounts plus inter-bank borrowings with at least two years to maturity.

These rules are subject to special procedures where foreign currency assets or liabilities exceed 10% of a bank's balance sheet. In such cases the 60% liquidity ratio applies only to French franc items, the foreign currency business then being monitored rather than regulated, while the medium-term liquidity co-efficient must be calculated separately for both French franc and foreign currency transactions.

The liquidity rules apply only to French banks' domestic operations and therefore exclude the activities of their foreign branches. Nor are French branches of foreign banks assessed for liquidity. On the other hand French subsidiaries of foreign banks are in principle subject to the above requirements and in order to ensure that the medium-term liquidity co-efficient is met in respect of foreign currency business the CCB may demand a guarantee or stand-by line of credit from the parent bank.

In addition to the above liquidity rules, banks have since 1967 been prohibited from paying interest on sight deposits. This restriction is designed to encourage reliance on longer term deposits and thereby reduce the degree of maturity mismatching in banks' balance sheets.

4. Permissible Business Activities

Banks are in general prohibited from directly engaging in activities which have no connection with banking. However, deposit banks may purchase holdings in non-bank companies up to a ceiling of 20% of the share capital of any one company, so long as the total amount of such holdings does not exceed the investing bank's capital. Investment banks may hold 100% of the share capital of a company but must not finance non-bank equity holdings with sight deposits and term deposits due in less than two years. Deposit banks are not permitted to invest their sight deposits, or term deposits due in less than two years, in property.

5. Foreign Currency Exposure

Although, for balance of payments reasons, French banks are prohibited from taking open positions against the French franc, they are

permitted to take positions in one foreign currency against another. Such exposure is nevertheless monitored closely by the authorities who may intervene where risks are considered excessive.

6. Loan Concentrations and Country Risk

Under a new standard introduced in 1979, no customer may account for a risk equal to more than 75% of a bank's capital, although the rule does not apply where the risk amounts to 5% or less of the bank's total risk exposure to all customers and to 50% or less of the customer's bank debts. In addition, the total of individual risks in excess of 25% of capital must be less than 10 times capital. Inter-bank lending is excluded for the purpose of these calculations.

The loan limits are not in practice applied to country risk exposure although arguably the CCB could choose to interpret them in this way on the grounds that borrowers from the same country are financially linked. At present country risk exposure is not monitored on a consolidated basis and the authorities do not, as a matter of course, assess banks' country risk evaluation procedures. More generally, country risk evaluation is considered to be a matter for bank management rather than the regulatory authorities.

7. Bank Examination

Bank auditors do not have a special role to play in the supervisory process and the CCB therefore relies on on-site examinations by the Bank of France's inspectorate to verify prudential returns, assess internal control procedures and examine the quality of loans. Inspections may be ad hoc or routine (though the frequency may vary between 1-2 years and 10 years), they are generally confined to the bank's head office and do not extend to the foreign branches or subsidiaries of French banks. Since the enactment in 1980 of a law restricting the provision of commercial information to other countries, foreign supervisory authorities have not been permitted to undertake on-site bank inspections in France.

8. Deposit Insurance

There is no official deposit insurance scheme covering French banks. However, the AFB set up its own deposit protection arrangements in 1979 when it became clear that the Treasury and the CNC were considering the establishment of an official scheme. The AFB arrangements, which were formulated jointly with the authorities, are territorial in scope and therefore embrace all banks, including foreign banks, operating in France while excluding foreign branches of French banks.

Deposits are protected up to a ceiling of FF200,000 per depositor per institution subject to the exclusion of inter-bank deposits, certificates of deposit and foreign currency deposits. There is no deposit protection fund and participating banks are required to contribute directly to any deposit pay-offs according to a graduated scale, based on each bank's deposit total, which in effect favors larger banks against the smaller. The scale of contributions, incorporating an absolute cut-off point beyond a specified deposit total, is designed to reflect the low riskiness of the large nationalized banks relative to the smaller private banks.

Since the scheme's inception in 1979 there have been six instances of (small) bank failures where the AFB has paid off depositors.

9. Lender of Last Resort and Emergency Measures

Under the French system of monetary control, which is based on quantitative credit ceilings, banks have automatic and unlimited access to official credit through the sale of eligible commercial paper to the Bank of France. In such a context it is difficult to distinguish the lender of last resort function from the normal functioning of credit markets. However, in 1974 the Bank of France did lend to one troubled institution on the basis of non-eligible paper at a special rate and in other cases the central bank may, in principle, provide support through the intermediation of one or other of the larger banks. The significance of the lender of last resort role will in any event be reduced as a result of nationalization.

Among other protective measures available to the authorities is the regulation of deposit interest rates. For instance the CNC recently increased the maximum size of deposit subject to interest rate regulation from FF100,000 to FF600,000 with a view to reducing banks' vulnerability to sharp increases in their cost of funds.

D. Germany

The Federal Banking Supervisory Office (SO) is charged with the supervision of banks, although it exercises its functions in close cooperation with the Bundesbank. Thus while the banks' financial reports are collected and evaluated by the Bundesbank, they are passed on to the SO whose responsibility it is to take appropriate steps in the light of such reports. Similarly, it is the SO's responsibility to issue detailed regulations on liquidity and capital adequacy, but only after reaching agreement with the Bundesbank.

Present supervisory arrangements reflect a number of reforms introduced in 1976 after the Herstatt crisis, including rules on risk-

spreading and foreign exchange exposure, the establishment of a life-boat fund for banks experiencing liquidity difficulties, and an extended deposit protection scheme. More recently these arrangements have been supplemented by a series of "gentlemen's agreements" aimed at extending the supervisory function to domestic banks' foreign operations. More far-reaching legislative reforms embodying proposals of the Commission of Enquiry into Basic Banking Questions (the "Gessler Commission") are expected to be incorporated in a new Bank Act in due course.

German branches of foreign banks are supervised and regulated as if they were domestic banks, and must comply with prudential ratios in the normal way. Under German law, too, such branches are subject to separate liquidation proceedings and head office claims subordinated to those of branch depositors.

1. Entry Controls

Any person wishing to conduct banking business requires a license from the SO. The SO can refuse a license only if one or other of the following criteria are not fulfilled: (1) adequate capital (a minimum of DM6 million is currently applied); (2) a trustworthy and professionally qualified management; and (3) at least two managers actively involved in running the business. Although the SO does not have a discretionary authority to reject license applications, it may subject any license to conditions which in the case of private commercial banks will normally include membership of the Deposit Protection Fund (below). German branches of foreign banks are subject to the same licensing criteria as domestic banks, for which purpose the head office must supply its branch with the appropriate amount of dotation capital. In addition, a license may be (but seldom is) refused to the branch of a foreign bank incorporated outside the EEC if "not justified in view of the overall needs of the /German/ economy".

2. Capital Adequacy

The basic capital adequacy rule is that loans and participations should not together exceed 18 times equity capital plus reserves (subordinated debt is not included). However, certain secured and guaranteed loans as well as loans to foreign banks are assessed for this purpose at only half their value, while loans to domestic banks (including domestic branches of foreign banks) are assessed at only 20% of their value. Furthermore, loans to the public sector are exempt from any capital requirement. After allowing for such adjustment capital ratios may de facto fall significantly below the implied basic minimum of 5.6%. Failure to com-

ply with the requirements creates a rebuttable presumption that the equity capital of the bank is insufficient and must be corrected.

German branches of foreign banks are, for reasons of competitive equity, subject to the same capital requirements as domestic banks. Branch capital is defined as (1) the working capital made available to the branch by its foreign parent plus (2) operating surpluses retained by the branch less (3) any net claims by the branch on intercompany account.

Until now the capital adequacy criteria have not been applied on a consolidated basis, nor does the SO have the statutory authority to do so. However, the Gessler Commission recommended consolidation for this and other supervisory purposes and pending legislative reforms the commercial banks have voluntarily undertaken to provide consolidated financial data in respect of wholly or almost wholly owned subsidiaries. It is intended that this data should in due course provide the basis for assessing capital adequacy.

3. Liquidity Control

There are two basic liquidity rules which together limit the extent of maturity transformation in a bank's balance sheet while also recognizing that some proportion of shorter term liabilities may be viewed as a stable funding base. The first rule states that specified long-term assets should not exceed the sum of long-term financial resources, as defined, and the second requires that certain other non-liquid assets be backed by appropriate financial resources, comprising specified proportions of different liability categories. A central feature of this formula is that bank liabilities are classified both by maturity and velocity of turnover with a view to determining the extent to which they may prudently be used as a basis for maturity transformation. As with capital adequacy, failure to conform to the liquidity guidelines carries a presumption that corrective action is needed. There are currently no plans for assessing liquidity on a consolidated basis.

4. Permissible Business Activities

Universal or multi-purpose banking is an established feature of the West German financial system. The Gessler Commission examined the desirability of imposing constraints on the kinds of business (particularly securities business) that banks could undertake but fundamental legislative reforms were not recommended and are not to be expected in this area.

5. Loan Concentrations and Country Risk

Every 'large' loan, defined as a loan to one borrower exceeding 15% of the lending bank's capital, must be reported immediately to the

supervisory authorities. Furthermore, no single loan should exceed 75% of a bank's capital while the five largest loans and all 'large' loans together should not exceed, respectively, three times and eight times a bank's capital. These limits are now calculated on a consolidated basis but they do not apply directly to country risk where several borrowing entities from one country may be involved.

Country risk is monitored on the basis of exposure data classified by various country groupings (EEC, other industrial, developing, OPEC and Comecon). However, it has not so far proved possible to obtain consolidated data on loans to individual countries or even groups of countries, due partly to local bank secrecy laws. The auditors' reports to the SO must refer to the methods used to evaluate country risk, although the authorities do not themselves take an independent view on individual countries' financial prospects.

6. Foreign Exchange Exposure

A bank's net open position in foreign currencies and precious metals, irrespective of the maturity of individual commitments, should not in aggregate exceed 30% of capital. Furthermore, in order to minimize the fulfillment risk arising from differing maturities of assets and liabilities, even where the positions are matched in amount, net foreign currency positions maturing in any calendar month or half year should not exceed 40% of capital. Since net long as well as net short positions in individual foreign currencies are aggregated for the purpose of these calculations, the effective maximum long or short position in one foreign currency or group of foreign currencies against other foreign currencies is 15% rather than 30% of capital. In contrast, a banks' aggregate long or short position in foreign currencies against the Deutschemark may be as high as 30% of capital.

7. Bank Examination

Bank supervision is based on annual auditors' reports to the supervisory authorities rather than on-site examinations by the regulators themselves. Bank auditors are required by statute to report breaches of the law, facts which might endanger the existence of a bank and, at the request of the authorities, any other facts which suggest that the business of the bank has not been conducted properly. Under a recent amendment to the law the SO may itself carry out spot checks by conducting its own audits without any special reasons being given.

8. Deposit Insurance

There is no statutory scheme for deposit insurance but the banking associations for the private commercial banks, savings banks and credit associations have, with official encouragement, each set up their own voluntary deposit protection schemes. The Federal Association of German Banks has established a Deposit Protection Fund for the private commercial banking sector which protects non-bank deposits with member institutions up to a limit, per depositor, of 30% of a bank's stated equity capital. The scheme is funded by an annual membership levy and in the case of German subsidiaries of foreign banks (whose licensing terms generally require participation) legally binding letters of indemnification are sought from the parent requiring it to reimburse any payments by the fund to the subsidiary's depositors.

The coverage of the Deposit Protection Fund extends to foreign branches of German banks, foreign currency deposits and deposits by non-residents. However, there are also some limitations: most but not all private commercial banks participate; the potential pay-out is limited by the size of the Fund; and the pay-out is at all times discretionary not mandatory.

10. Lender of Last Resort

In the aftermath of the Herstatt collapse, when a number of banks had to be given liquidity assistance on an ad hoc basis, the Bundesbank joined with the domestic banking industry in setting up the Liquidity Consortium Bank (Liko-Bank). The sole function of this institution is to give assistance to banks that have run into temporary liquidity difficulties but are otherwise sound, for which purpose it can engage in all normal banking transactions. The Liko-Bank's equity capital, 30% of which is subscribed by the Bundesbank, amounts in all to DM1 billion (DM250 million paid up, DM750 million unpaid). In addition it has been granted a special rediscount ceiling by the Bundesbank, a facility which reflects the central bank's continuing role as lender of last resort.

The Liko-Bank may offer support to any bank licensed to do business in Germany, including branches of foreign banks. Foreign branches (but not subsidiaries) of German banks are also eligible for support. There is no legal constraint on lending in foreign currencies, although such activity is not presently envisaged.

E. Hong Kong

Apart from its traditional role as a lending rather than a funding center — an emphasis that may now change with the abolition of with-

holding tax on offshore deposits—Hong Kong has a number of characteristics that distinguish it from other financial centers such as Singapore. Firstly, there is no separation of domestic and offshore banking business, so that foreign banks may engage freely in both. Secondly, Hong Kong is not merely host to a large number of foreign banks but is also the headquarters of several large banks, notably the Hong Kong and Shanghai Bank (Hong Kong Bank) with substantial branching operations abroad. Thirdly, because there is no central monetary authority, the Hong Kong Bank fulfills several central banking functions.

Prudential regulation is based on the Banking Ordinance which is administered by the Commissioner of Banking (CB). For regulatory purposes there was until recently a two-tier banking structure comprising licensed banks and registered deposit-taking companies (DTCs). However, the rapid growth of DTCs raised concerns about the size and stability of the secondary banking sector and led to a new distinction between licensed and registered DTCs as well as to a number of restrictions on registered DTCs that were designed both to reduce the scale and lengthen the term of their deposit-taking business. The new banking structure comprises 125 licensed banks, an emergent group (currently 8) of licensed DTCs or merchant banks and 346 registered DTCs. Only the licensed banks can accept short-term retail deposits.

Reflecting the importance of local banks' overseas operations, the Banking Ordinance was amended in early 1982 with a view to strengthening the CB's supervision of these activities. At the same time the CB's discretion to allow foreign supervisors to inspect banks in Hong Kong was formalized. Both these initiatives were designed to conform to the principle of parental responsibility in supervisory matters.

1. Entry Controls

Bank licenses are issued by the Governor in Council on the advice of the CB. Although there are a number of criteria that must be met before a license will be granted the decision whether or not to grant remains discretionary and from time to time the authorities have declared moratoria on new licensing with a view to avoiding excessive competition within the banking industry. Licenses are granted only in respect of branches, not subsidiaries, of foreign banks on the grounds that branches enjoy the full support of the group to which they belong. Such branches may be licensed only if (a) the parent bank is effectively supervised in its country of origin and the parent supervisors have no objection; (b) the parent bank has total assets of at least US$10 billion; and (c) some acceptable form of reciprocity exists. Locally incorporated banks, on the other hand, must have paid-up share capital of at least HK$100 million,

deposits from the public of at least HK$1.5 billion and total assets of HK$2 billion, and they must have been in the deposit-taking business for at least ten years.

2. Capital Adequacy

A licensed bank incorporated in Hong Kong is required to appropriate at least one third of its published earnings each year to a published reserve until the paid-up capital and published reserve together amount to HK$200 million. In addition, banks are encouraged to maintain inner reserves which can be used to absorb unexpected losses. Beyond this the CB has recently been given statutory powers to obtain detailed information from locally incorporated banks relating to their overseas subsidiaries and affiliates. It is intended that such data should in due course permit the introduction of a capital ratio to be applied on a consolidated world-wide basis. The capital adequacy of banks incorporated outside Hong Kong is, however, viewed as a matter for the parent bank's supervisory authorities.

3. Liquidity Control

Hong Kong's liquidity rules, which relate to monthly averages, have a prudential rather than a monetary function. The rules embrace foreign as well as local currency business and they apply also to local branches of foreign banks which for this purpose are deemed to be separate entities. Banks must hold the equivalent of 25% of their deposits in the form of liquid assets realizeable within seven days and 15% of their deposits (included in the 25%) in the form of highly liquid assets realizeable on demand. The amount of liquid assets is calculated after deducting short-term interbank borrowings from other banks in Hong Kong. Highly liquid assets include cash, gold and demand and call money at other banks, while the broader category of liquid assets includes money at short notice at other banks, certain export bills of exchange, various government or government-guaranteed securities which are deemed to be realizeable within seven days, and such money market instruments as the Financial Secretary may specify.

4. Permissible Business Activities

There is no formal separation of commercial and investment banking in Hong Kong. A bank must not engage in any wholesale or retail trade but can provide most financial services, including the underwriting of securities, so long as the book value of its non-bank shareholdings does not exceed 25% of its capital and reserves. A similar 25% limit applies

to holdings of property (excluding bank premises) while unsecured lending to directors, their relatives and related companies is limited to 10% of capital and reserves. All three classes of restricted asset are subject to an aggregate limit of 55% of capital or 80% if account is also taken of property used as banking premises.

5. *Loan Concentrations and Country Risk*

For both banks and DTCs there is a maximum lending limit to any one customer of 25% of capital and reserves. For an institution incorporated outside Hong Kong the limit is measured against the capital of the head office in the country of incorporation. Locally incorporated but foreign-owned DTCs are expected to provide letters of comfort from their parent shareholders and in such cases the 25% limit is waived. These letters of comfort are not legally binding although they must be the result of a board decision and be issued with the knowledge of the parent institution's supervisory authority.

The loan concentration limit does not apply to country risk where several borrowing entities are involved. Country risk exposure is not at present regulated, although consolidated exposure data is provided for BIS purposes.

6. *Foreign Currency Exposure*

Non-consolidated foreign currency exposure data is collected on a month-end basis but there are no guidelines in this area. Formal exposure limits might be expected to give rise to difficulties in that the Hong Kong Bank, which in effect holds the banking system's residual liquidity offshore, has a naturally long position in foreign currencies (windfall profits and losses from this exposure being taken into or absorbed by hidden reserves).

7. *Bank Examination*

The CB, who has 24 examination teams, each comprising 4 examiners, aims to examine locally incorporated banks (and DTCs) once every 12 months and branches of foreign banks once every 24 months. In March 1982 the CB was also given powers to inspect the foreign branches (but not subsidiaries) of locally incorporated banks. This new legislation formalizes the existing practice of allowing appropriate foreign supervisory authorities to inspect the Hong Kong branches or subsidiaries of banks incorporated in their jurisdiction. It also relaxes the domestic secrecy laws so as to permit the CB to provide information on local banks to appropriate foreign supervisory authorities.

8. Deposit Insurance

Hong Kong has no formal deposit protection scheme. When the possibility of introducting such a scheme was raised after the 1965/66 financial disturbances the larger banks objected and the matter was not pursued further. In one of the bank failures of 1965/66 depositors did lose approximately one third of their money, but in a subsequent failure, when the authorities were particularly concerned about possible adverse confidence effects, means were found of protecting depositors in full.

9. Lender of Last Resort

The day to day lender of last resort is the Hong Kong Bank which, in fulfilling its clearing function, may provide liquidity assistance on terms of its choosing to any bank faced with a funding shortfall at the daily clearing. Beyond this the Hong Kong Bank may, either on its own initiative or at the Government's behest, provide emergency assistance on a longer term basis or, where more protracted difficulties are evident, acquire the troubled bank (as happened with Hang Seng Bank in 1966). The true lender of last resort is, however, the Hong Kong Government whose Exchange Fund currently amounts to some HK$35 billion (the precise figure is not disclosed), most of which is invested in US dollars. In 1965, the Government exercised its lender of last resort role by depositing sterling funds in London for the use of the Hong Kong Bank and the Chartered Bank who at that time were providing liquidity assistance to a number of other Hong Kong institutions.

F. Italy

The Bank of Italy is responsible for regulating the domestic banking system, subject to directives from the Inter-Ministerial Committee for Credit and Savings (ICCS) and within the framework of the Banking Law of 1936. The Banking Law draws a distinction between short-term and longer-term banking business: banks entitled to accept short-term deposits (defined as up to 18 months) are not permitted to accept medium or long-term deposits and their term lending beyond 18 months is also subject to restrictions.

The structure of the banking system is complex and, at the regional level, highly fragmented. There are some 900 rural, co-operative and savings banks, over 100 privately owned commercial banks and 31 commercial banks (including the four largest) controlled either by the Treasury or the state industrial conglomerate, IRI.

1. Entry Controls

Banks may not commence business or open new branches without prior authorization, the main criteria being (1) minimum capital, (2) a reputable management and (3) economic justification. The Bank of Italy has not laid down a uniform minimum capital requirement, although branches of foreign banks must possess dotation capital of at least $12 million. Since 1966 the economic need criterion has been invoked to withhold all new bank authorizations, other than those for branches of foreign banks. In addition, the Bank of Italy has confined banks' domestic branching activities to prescribed geographic regions, with a view to avoiding excessive competition which might threaten the stability of the banking system.

Italian banks seeking to establish foreign branches/subsidiaries must obtain the approval of the Bank of Italy which is in practice granted only to the larger institutions. The authorities have recently sought to increase the transparency of banks' foreign operations by limiting the scope for multiple subsidiary holdings.

2. Capital Adequacy

The Bank of Italy has statutory powers to lay down minimum capital ratios, subject to the approval of the ICCS. However, no formal ratios have been established, the official view being that standardized capital adequacy requirements are inappropriate to a heterogeneous banking system such as Italy's; that such requirements might prove to be an unacceptable burden given the various constraints imposed on banks' balance sheets for monetary policy purposes; and that the concentration and liquidity ratios (among others) already provide banks with an incentive to maintain their capital base.

The Bank of Italy monitors capital adequacy on the basis of both gearing and capital/risk assets ratios. Capital is defined to include reserves (undisclosed reserves are no longer allowed) and general provisions, but loan capital is not permitted. One of the main objectives of the monitoring process is to identify those banks whose capital ratios are significantly below their category average.

3. Liquidity Control

Although there is no formal prudential liquidity requirement, the Bank of Italy does monitor banks' liquidity on the basis of seven separate ratios. For this purpose foreign currency and local currency items are considered both separately and in the aggregate while a distinction is also made between primary and secondary liquidity. In the case of the broadest liquidity measure - the ratio of total liquidity to

deposit liabilities plus funds of third parties managed by the bank - a minimum co-efficient of 15% is expected.

Banks entitled to accept short-term deposits may now make medium-term loans, with maturities ranging from 18 months to five years, but only up to a total of between 10 and 15% of their deposit liabilities. The precise limit is calculated according to a scale based on the lending banks' capital ratio. Foreign offices (including branches) of Italian banks are not covered by this restriction on medium term lending.

4. Permissible Business Activities

In practice the Bank of Italy does not permit banks to engage in business other than banking and equity participations in non-bank companies are generally limited to complementary activities such as data processing. Beyond this, banks are entitled to make share purchases of up to 2% of a company's share capital but such holdings must not in total exceed 100% of the acquiring bank's capital. Banks are not normally permitted to invest in property other than their own premises.

5. Loan Concentrations and Country Risk

Loans to a single customer may not exceed the lending bank's capital without special authorization from the Bank of Italy. Furthermore, 'large' loans (defined as those exceeding 20% of capital) may not in total exceed a ceiling varying between 25 and 40% of non-bank deposits, the precise limit depending on the bank's capital ratio. These loan limits are not, however, directly applicable to country risk exposure involving several borrowing entities from the same country. The authorities do not monitor such exposure on a consolidated basis and although a survey was recently conducted of banks' country risk evaluation procedures, the area of country risk is viewed as being the responsibility of bank management rather than of bank regulators.

6. Foreign Currency Exposure

No formal prudential limits are applied although net positions in individual currencies must be reported at least monthly and foreign exchange activity is strictly regulated for exchange control purposes. In particular, banks may not take net positions against the lira and must maintain balanced positions in US dollars, in EEC currencies taken together and in other currencies taken together.

7. Bank Examination

On-site bank inspections, aimed inter alia at verifying prudential returns and assessing the quality of loans, are carried out by the Bank of

Italy on both an ad hoc and routine basis, the broad objective being to examine each bank's head office every 3-4 years. Foreign offices of Italian banks are not normally inspected, although under a recently concluded bilateral agreement the US and Italian supervisory authorities may inspect branches of their respective domestic banks on each other's territory.

8. *Deposit Protection*

The fact that over 50% of bank deposits are placed with public sector institutions has had an important bearing on the authorities' approach to deposit protection. The Bank of Italy's practice has been to encourage the merger of smaller banks facing financial difficulties or to arrange for support in other forms from larger institutions. In 1974 this procedure was formalized by a decree authorizing the Bank of Italy to extend special low interest loans to banks willing to acquire failing institutions where liquidation proceedings had already been initiated. One consequence of this approach is that there have been no deposit losses with domestic banks in recent years. Foreign branches, though not subsidiaries, of Italian banks are in principle covered by the subsidized loan scheme, as are Italian subsidiaries of foreign banks. Italian branches of foreign banks are, however, subject to other arrangements (below).

9. *Lender of Last Resort and Emergency Measures*

In instances of prospective bank failure/insolvency the Bank of Italy lends at a low interest rate to the acquiring bank, as described above. To accommodate temporary liquidity difficulties the central bank provides a line of credit to each bank based on its balance sheet size on which drawings may be made, backed by collateral in the form of public sector securities, at the official discount rate. The interest rate charged is subject to a graduated premium where frequent use is made of the facility.

Subsidiaries of foreign banks (of which there are very few) are not asked for letters of comfort from their parent banks, but branches of foreign banks are required to produce a declaration by their head office. This is in standard form and asserts that under its own law the head office is liable to the full extent of its assets for the liabilities of its Italian branch.

Under Italian law local branches of foreign banks are subject to separate liquidation proceedings, as in the case of Intra-Bank's failure where the Italian branch's assets were used to pay off all branch creditors before remission of the surplus to the main liquidator.

G. Japan

Japan has 76 domestic commercial banks, comprising 13 city banks and 63 regional banks. In addition there are 70 foreign banks, 10 long-term lending banks, 71 sogo or mutual banks and some 1,000 credit associations and co-operatives. The foreign banks are in effect confined to branch rather than subsidiary form, reflecting in part the authorities' preference for branches on prudential grounds.

The relatively small number of commercial banks has enabled the authorities to adopt a highly informal approach to bank supervision based on administrative guidance. For this purpose the Banking Bureau and the International Finance Bureau of the Ministry of Finance (MoF) are the main supervisory agencies, although the Bank of Japan (BoJ) also has a role in this area which it fulfills in close consultation with the MoF. The new Banking Law that came into effect on April 1st 1982 is intended, among other things, to shift the emphasis away from administrative guidance towards a more formal regulatory regime. However the new law does not have a great deal to say on the subject of prudential regulation and the MoF retains considerable discretionary powers regarding those matters which are covered. Furthermore, it remains to be seen how far informal guidance may continue to be given outside the new legal framework.

The Japanese authorities have accepted in principle the desirability of supervising banks on a consolidated basis. On the other hand, because foreign subsidiaries account for a relatively small proportion of Japanese banks' overseas operations, consolidated supervision has not yet been adopted in practice.

1. Entry Controls

All banks must be licensed by the MoF. The statutory licensing requirements are (1) adequate resources (a minimum capital of yen 1 billion is specified but this may be raised by Cabinet Order); (2) a reputable and competent management; and (3) an economic need criterion. The MoF may impose additional conditions in the public interest while foreign banks are subject to a reciprocity test as well as to any other special conditions that may be determined by Cabinet Order.

2. Capital Adequacy

The MoF does not impose formal capital ratios, nor does it assess capital adequacy on a consolidated basis. However, the following broad guidelines have been indicated:

(1) Banks should aim to keep the ratio of fixed assets to capital below 40%, with an upper limit of 50%.
(2) The ratio of capital to deposit liabilities should be maintained at 10% or more (for the major city banks, whose deposits represent some 75% of total liabilities, actual ratios appear typically to have been well below the target).

The MoF has also sought to encourage capital accumulation by offering guidance on maximum dividend pay-outs. Finally, it may be noted that the new ceilings on loans to a single borrower (below) have induced most of the major banks to increase their capital over the past 18 months. For the purposes of capital adequacy assessment, capital is defined as equity capital plus reserves, the issuance of subordinated debt being allowed only to the long-term credit banks.

3. Liquidity Control

As with capital adequacy, the MoF has declined to impose general liquidity norms, although it has encouraged banks to raise the ratio of current assets to total deposits to at least 30%. Following the disturbed financial conditions of 1974/75 the Japanese authorities have also sought to limit maturity mismatching in banks' Euro-currency operations, the guidance here being that 40% of term lending for one year or more should be funded by term deposits or other debt of over one year's maturity. This guideline applies to the foreign branches but not subsidiaries of Japanese banks, although foreign subidiaries have recently been requested by some host countries (for instance Switzerland) to increase their long-term borrowing. Finally, the concentration of domestic long-term lending in the long-term credit banks and trust banks is calculated to reduce maturity mismatching in the banking system as a whole.

4. Permissible Business Activities

Following the American pattern, the Securities and Exchange Act of 1948 prohibits banks from underwriting securities other than public sector bonds. However, the separation of commercial and investment banking is regarded as an historical accident rather than a prudential necessity and is currently under review. Already the distinction is becoming blurred in overseas markets where subsidiaries of Japanese banks underwrite Eurobonds and the European offices of Japanese security houses have, with MoF approval, applied for local banking status. This issue apart, the Banking Law prohibits banks from engaging in activities other than banking, as defined, while the Anti-Monopoly Law restricts banks' equity investments in bank-related businesses.

5. *Loan Concentrations and Country Risk*

The Banking Law provides for maximum lending limits to individual borrowers to be determined by Cabinet Order, subject to certain exemptions in respect of loans to or guaranteed by the public sector. The present ruling is that loans to a single borrower should not exceed 20% of capital in the case of commercial banks, 30% for long-term credit and trust banks and 40% for the one specialized foreign exchange bank (Bank of Tokyo). This differentiation reflects the traditional business roles of the institutions concerned - for instance the Bank of Tokyo has large exposures to the Japanese trading houses - rather than special prudential considerations. The loan limits applicable to Japanese branches of foreign banks are calculated on the basis of the banks' group capital.

The loan concentration rules are not directly relevant to banks' country risk exposure, although it has been reported that the authorities intend to apply comparable guidelines in this area. Country exposure data is not currently monitored on a consolidated basis and the authorities disclaim any responsibility for making an independent assessment of individual countries' financial prospects. However, banks' country risk evaluation methods are considered as part of the bank examination process.

The MoF has given extensive guidance on the overall volume of Japanese banks' new international lending (currently limited to 10-12% of the total syndicated loan market), the proportion of such lending to be directed to developing countries, the maximum participation of Japanese banks in individual syndications (recently raised from 20% to 50%), the desireability of Japanese banks exercising independent judgement by acting as lead managers/agents, and the size of spreads. Guidance in these areas reflects a number of concerns, notably the MoF's view that, because of their domestic business experience based on a rigid interest rate structure, Japanese banks are inclined to compete for volume in international markets without sufficient regard for price and quality.

6. *Foreign Currency Exposure*

Monitoring of foreign currency exposure embraces the foreign branches but not subsidiaries of Japanese banks. Each bank is given an absolute net (spot and forward combined) exposure limit based both on its volume of foreign exchange transactions and its capital base. A general norm, measured in terms of percentage of capital exposed, is not applied although as a matter of practice exposure is generally kept below 10% of capital.

7. *Bank Examination*

On-site bank examinations are of three kinds. The MoF's International Finance Bureau carries out inspections mainly in the area of foreign exchange dealings; the Banking Bureau undertakes a broader prudential examination; and the Bank of Japan (which has a separate inspectorate) makes a mainly qualitative assessment of loan portfolios and bank management. The Banking Bureau aims to examine the head office and randomly selected branches (including foreign branches) of domestic banks every 2-3 years. Japanese branches of foreign banks are examined every 5-6 years, although foreign supervisors may be permitted to carry out their own inspections.

8. *Deposit Insurance*

Since 1971, Japan has had a deposit insurance scheme which is jointly capitalized by the Government, the Bank of Japan and the banking industry. The coverage is non-territorial in that all yen deposits held by residents and non-residents with Japanese banks and their overseas branches are insured, while Japanese branches of foreign banks are excluded. Neither foreign currency nor inter-bank deposits are covered. There is a yen 3 million (approximately US$13,000) maximum payable to each depositor per institution, although in the absence of any recent bank failures no deposit pay-offs have had to be made. Participant banks contribute an annual levy (currently 0.008% of their insured deposits) to the insurance fund which now amounts to around 100 billion yen or 0.035% of total insured deposits. Given the modest size of the fund, the official intention is to raise the scale of contributions in stages over the next several years. The fund may, if necessary, be supplemented by borrowings from the BoJ although it has been officially stated that the system "is not intended to cope with a general financial panic."

9. *Lender of Last Resort*

Routine liquidity assistance is provided on a day-to-day basis by the BoJ at bank rate. For this purpose each bank, domestic and foreign, has a commercial bill discount quota based on the size of its yen assets. Foreign banks are given a proportionately higher discount quota because their yen assets are relatively small. Longer term liquidity assistance may also be provided at bank rate, although such lending must (in the absence of a special MoF waiver) be adequately collateralized. The BoJ regards itself as a lender of last resort in yen only, although if a bank experiences a liquidity short-fall in foreign currency the BoJ may, in principle, make yen available for conversion into foreign currency. During the international financial disturbances of

1974, when some Japanese banks experienced difficulties in securing dollar funds, the Bank of Tokyo provided large-scale liquidity assistance, borrowing dollars in its own name at a small margin over LIBOR and channelling funds to those banks in need.

H. Luxembourg

The Commissariat au Controle des Banques (CCB), in conjunction with the Ministry of Finance, is responsible for regulating and supervising the banking system. For this purpose the CCB is advised by the Conseil de Controle des Banques, which includes representatives from the banking industry.

The Luxembourg banking system has a number of features which have a direct bearing on the authorities' approach to regulation. The country is host to over 100 foreign banks and accounts for one quarter of all euro-currency credits to non-bank borrowers; over 85% of all banking business is denominated in foreign currencies, with the Deutschemark accounting for approximately half of the foreign currency total; and there is no central bank with the result that the authorities must look to foreign parent institutions (and their central banks) for support of their Luxembourg operations.

1. Entry Controls

The authorization requirements for banks wishing to establish themselves in Luxembourg include a reputable and competant management and a minimum capital which is currently set at 350 million francs, of which 250 million must be paid up. The relatively high minimum paid-up capital requirement applies equally to branches of foreign banks, and is designed to limit market entry to banks of substance. Under a recent amendment to the law each bank must also show that it has sufficient private credit lines for its own purposes, a provision which confers on the CCB a wide discretion to demand irrevocable stand-by credit lines. Authorization is also required for Luxembourg banks seeking to establish branches or agencies abroad.

2. Capital Adequacy

In addition to the minimum capital requirement, the CCB is authorized, with the approval of the Ministry of Finance, to set a mandatory solvency ratio (ratio of capital to liabilities) within a statutory range of 3 to 10%. Since its inception this ratio has been held at the minimum level of 3%. The ratio is applied to the combined assets and liabilities of

Luxembourg banks and their foreign branches and also to the branches of foreign banks, but is not calculated on a consolidated basis.

For this purpose capital is defined to include share capital, reserves, retained earnings and general provisions while subordinated debt due in over one year may, at the CCB's discretion, be included up to 50% of the amount of paid-up capital and reserves. Liabilities exclude fiduciary deposits as well as, in the case of branches of foreign banks, short-term liabilities to the bank's head office.

As a separate requirement, fixed assets plus participations must not exceed capital (excluding subordinated debt).

3. Liquidity Control

The CCB does not enforce any prudential liquidity ratios, although it has recommended that banks should hold liquid assets (as defined) equal to 30% of their liabilities.

4. Permissible Business Activities

There are no statutory restrictions on the type of business that a bank may undertake. Nor are there any restrictions on shareholdings in non-bank companies, although such participations are included in fixed assets and must therefore be covered by equity capital.

5. Foreign Currency Exposure

Banks' operations in the official market are subject to foreign exchange controls. There is no formal prudential regulation of foreign currency exposure in the free market (chiefly used for capital transactions) although banks' open positions, both spot and forward, are regularly reported and any position in excess of 30% of capital is monitored closely.

6. Loan Concentrations and Country Risk

There are no formal limits on loans to single borrowers although loans of more than 50 million francs (or, in the case of banks with capital below 500 million francs, loans equivalent to 10% or more of capital) must be reported to the CCB. Country risk exposure is not formally regulated.

7. Bank Examination

Routine examinations by the CCB take place annually and an independent audit of banks is also now mandatory (which was not previously the case). Foreign supervisory authorities are not permitted to inspect banks in Luxembourg and while the Luxembourg secrecy laws

have been relaxed to enable subsidiaries of foreign banks to make more information on their lending available to their parent institutions, individual borrowers may not be identified. In addition, the Luxembourg authorities now have a broad discretion to disclose information about locally based banks to foreign supervisors. However, this discretion does not extend to revealing details of a bank's country exposure.

8. Deposit Protection

There is no official or privately organized deposit protection scheme, partly because most of the banking business conducted by Luxembourg banks is wholesale not retail. As a matter of practice, no deposit losses have been incurred in recent years.

9. Lender of Last Resort

The National Bank of Belgium, which has a branch in Luxembourg, provides liquidity support in respect of local currency banking and for this purpose is prepared to discount certain claims on or guaranteed by the Luxembourg government. There is, however, no support facility for the Euro-banks who must look to their parent institutions for liquidity assistance. The CCB does not demand letters of comfort for this purpose but under a recent amendment to the law it may require irrevocable stand-by credit lines (above).

I. The Netherlands

The Nederlandsche Bank is responsible for enforcing the Act on the Supervision of the Credit System which was substantially revised in 1978. The central bank's prudential responsibilities cover the universal banks, co-operative banks, savings banks and mortgage institutions, although in the case of the savings banks and certain co-operative banks, supervision has been delegated to the appropriate association. The supervisory system is in one sense highly formal, involving, for instance, detailed regulations on solvency and liquidity requirements, but the central bank also attaches considerable importance to its informal contacts with management.

Branches of foreign banks are, for prudential purposes, treated in the same way as domestic banks. The revised Act also confers on the creditors of such branches preferential rights to branch assets in the Netherlands, thereby offering some possibility of the recovery of their claims in the event that the parent institution should fail.

1. Entry Controls

In order to be licensed by the Nederlandsche Bank, commercial banks

must have a minimum capital of F1 500,000 (shortly to be raised) and a managing board consisting of at least two persons of proven expertise and trustworthiness. Branches of foreign banks must meet the same licensing criteria as domestic banks and for this and other purposes are required to maintain separate branch accounts, identifying the amount of dotation capital from their parent institutions.

2. Capital Adequacy

The solvency regulation requires that a bank's capital must at least equal the total value of its fixed assets. More importantly, assets are broken down into different risk categories against which capital must be held in proportions varying between 0% and 100%, with a norm for risk-bearing assets of 10%. Under this scheme loans to foreign entities are at present treated relatively favorably: for instance loans guaranteed by foreign public authorities or foreign banks are subject to a 5% capital requirement while loans to foreign governments and banks are exempt (although these exemptions are expected to be removed shortly). In addition to risk assets, certain contingent liabilities as well as uncovered foreign exchange positions are included in the ratio calculations. Large credits, as defined, attract a premium solvency requirement (below).

Solvency ratios are calculated on a consolidated basis, with consolidation of majority holdings and minority holdings of over 10% effected pro rata. Capital is defined, for the purpose of the regulation, to include paid-up capital plus reserves (published and hidden) plus subordinated debt but only in so far as (a) it does not exceed 100% of capital and reserves and (b) annual redemptions do not exceed 5% of capital and reserves (the latter constraint means that subordinated debt is in practice generally no more than one third of capital and reserves). For branches of foreign banks, capital is calculated after deducting funds channelled back to the head office.

3. Liquidity Control

The liquidity regulation distinguishes between non-liquid, broadly liquid and highly liquid assets, although the requirements relating to the last are not yet in operation. Highly liquid assets include balances at the central bank and giro institutions, call money, Treasury bills and notes due in 90 days or less, advances against such bills/notes, bank deposits due within one month and certain public sector loans due within three months. Broadly liquid assets consist of highly liquid assets plus rediscountable bills and notes, securities and advances against securities.

The precise regulations are complex but in essence liabilities are classified by both category and maturity band; certain non-liquid assets are

then deducted from liabilities within the same maturity band; and the resulting net liability positions attract a liquidity requirement that varies according to both maturity band and category of liability. In general, net liabilities due within two years require a 20% backing of broadly liquid assets, and a 4% backing of highly liquid assets, but there is an exception, for instance, in the case of interbank liabilities due within one month where the requirement for broadly liquid assets is 100%.

The liquidity regulation is designed not merely to limit the extent of maturity mis-matching but also to guard against excessive reliance by banks on money market financing. In addition, it is intended to discourage undue deposit concentrations by imposing extra liquidity requirements on "large item" liabilities which individually amount to between 1% and 2% and together to 15% or more of total liabilities or which individually amount to over 2% of total liabilities.

4. Permissible Business Activities

There are no direct restrictions on the types of banking business that may be undertaken and in practice banks engage in a wide range of activities including securities business and underwriting. On the other hand, equity participations of 5% or more are subject to the approval of the Minister of Finance which has been automatically witheld in the case of investments in non-financial companies. However, this policy was relaxed in 1980 and limited equity stakes in non-financial companies are now permitted if certain specified conditions are met. A bank's total investments in fixed assets (including property and non-financial companies) must not exceed its capital, although property not used in the bank's own business is given a concessionary 33% weighting for this purpose (a provision now under review).

5. Loan Concentrations and Country Risk

Under the solvency regulations, a bank is subject to an additional solvency requirement if its loans to one borrower exceed 15% of capital, while loans to one borrower exceeding 25% of capital are not, in general, allowable without the central bank's prior approval. For this purpose only, the branch of a foreign bank is assessed on the basis of group not branch capital.

The rules on loan concentration do not apply directly to country risk. Furthermore, loans to foreign governments are free of any solvency requirement (an exemption which is under review). However, the central bank monitors country risk on the basis of half-yearly consolidated country exposure reports which banks have been required to submit since June 30, 1981.

6. *Foreign Currency Exposure*

There is no specific limit on banks' open foreign exchange positions but the central bank may require such exposure to be reduced where it exceeds the level considered appropriate for normal banking activities. In addition, the solvency regulation imposes a 2.5% capital requirement on uncovered foreign exchange positions. Banks report monthly on their positions, forward and spot, in all convertible currencies and copies of certain forward contracts must also be forwarded.

7. *Bank Examination*

The central bank has broad powers to inspect banks with a view to verifying returns received and, as a matter of practice, on-site inspection forms an integral part of the supervisory process. In addition, annual accounts must be drawn up according to a specified model by registered accountants who can be required by the central bank to supply any information that may reasonably be considered necessary for the central bank to carry out its duties. In the case of foreign banks, on the spot inspections are freely allowed to parent supervisors.

8. *Deposit Insurance*

The revised Act on the Supervision of the Credit System provided that, in the absence of a voluntary deposit insurance scheme, a Government scheme should be introduced. The voluntary (but comprehensive) scheme that came into effect at the beginning of 1979 applies to all banks and credit institutions in the Netherlands, including branches of foreign banks; it guarantees all deposits by individuals (but not companies) up to 30,000 guilders (index-linked) per depositor per institution; and it makes no distinction between resident and non-resident depositors or between guilder and foreign currency claims. However, deposits held with the foreign branches of Dutch banks are not covered. The scheme is not funded but is administered by the central bank which advances payments prior to apportionment among participant institutions. There is a maximum annual contribution per institution measured as a percentage of capital, designed to prevent contagious financial difficulties: any excess above this ceiling is funded by the central bank.

9. *Lender of Last Resort and Emergency Measures*

Section 15 of the Bank Act of 1948 gives the Nederlandsche Bank broad powers to provide liquidity assistance. However, Section 16 of that Act states that "the Bank shall grant no credit or advances without security", there being no further guidance on what constitutes security for this purpose. There have been only two recent bank failures in the

Netherlands, official support being provided prior to liquidition in one of these cases.

The authorities are authorized to regulate interest rates on demand deposits if excessive competition is threatening the stability of the credit system. Other emergency provisions include, in the case of troubled banks, the appointment of receivers with full management powers where, for instance, an arranged merger may be considered preferable to conventional bankruptcy proceedings.

J. Singapore

The Singapore banking system separates local banking business from international or offshore operations. This dual structure enables the authorities to promote Singapore's role as an international financial center while avoiding excessive competition in the domestic market. Accordingly within the commercial banking sector foreign-owned banks are in general prevented from engaging freely in local currency business, the precise limitations depending on whether the bank has a full, restricted or offshore licence. On the other hand any commercial bank can apply for an Asian Currency Unit (ACU) licence enabling it to set up a separate book-keeping unit authorized to participate in the Asian dollar market. Since 1974 Asian dollar deposits have been expanding at around 35% per annum and now, at some US$85 billion, account for 6% of the total Euro-currency market.

Foreign-owned commercial banks are confined to branch form on the grounds that a branch enjoys the full support of the group to which it belongs. There is, however, a separate category of locally incorporated merchant banks which are not permitted to accept deposits from the public but which can (and typically do) set up their own ACUs. Merchant banks currently account for around 11% of the Asian dollar market.

The Monetary Authority of Singapore (MAS) fulfills all the functions of a central bank, other than the issue of currency, and is also responsible for supervising the banking system within the framework of the 1970 Banking Act. In carrying out its supervisory function the MAS has recently adopted a policy of deregulation in the sense that detailed supervision of individual institutions is being replaced by generally applicable guidelines and greater reliance is being placed on external auditors in lieu of extensive prudential returns. At the same time responsibility for the supervision of foreign-owned banks is being shifted more to the parent institutions and their home supervisory authorities. In addition the Banking Act is under review and a number of changes relating, inter alia, to capital and liquidity adequacy are expected in due course.

1. Entry Controls

All banks are licensed by the MAS and for this purpose have to meet certain statutory capital requirements. Locally incorporated banks must possess paid-up capital of at least S$3 million while branches of foreign banks are subject to a S$6 million group capital requirement, S$3 million of which must be held in the form of approved assets in Singapore. In practice, however, the MAS may insist on more stringent capital requirements than the statutory minima. In addition, foreign banks wishing to establish an office in Singapore must be substantial and internationally reputable institutions. Finally, foreign-owned banks are expected to provide letters of comfort from their parent institutions undertaking to make good any local or foreign currency liquidity shortfall in their Singapore establishments. Reflecting the authorities' increased emphasis on the principle of parental responsibility the form of these undertakings has recently been hardened (a main Board resolution is, for instance, required) to the point where they are considered to be legally binding by some of the banks concerned.

2. Capital Adequacy

The MAS is authorized to impose mandatory capital ratios but has so far declined to adopt any general norms for commercial banks. However, commercial banks must maintain a reserve fund to which they are required to transfer at least 50% of annual net profits, so long as the fund is less than 50% of paid-up capital. If the reserve fund is between 50% and 100% of paid-up capital, the transfer need only be 25% of net profits and if the fund exceeds paid-up capital, the transfer can be reduced to 5% of net profits. Foreign incorporated banks may apply for exemption from these requirements.

Foreign-owned merchant banks are subject to a maximum gearing ratio which is set at 15x, 30x or 50x depending whether a letter of comfort has been obtained from the parent institution and whether the bank itself is an affiliate or a wholly-owned subsidiary. It is expected that some form of capital ratio requirement will in due course be applied to commercial banks.

3. Liquidity Control

All banks are required to maintain a minimum cash balance with the MAS, which is currently set at 6% of the banks' liability base. This ratio is used by the MAS as an instrument of monetary policy for the regulation of bank liquidity. Banks are also required to hold a minimum/ amount of liquid assets equivalent to 20% of their liability base, half of which must be in the form of primary liquidity (excess cash balances with the MAS, notes and coins, money at call with the discount houses,

Treasury bills and other Government securities with less than 12 months to maturity). Secondary liquidity includes commercial bills (up to 5% of the liabilities base) and Government securities of over 12 months to maturity. The liquidity ratio serves prudential and monetary purposes, although ACUs as well as merchant banks are exempt from both the cash and liquidity requirements.

4. Permissible Business Activities

There is no separation of commercial and investment banking but banks are prohibited from engaging in wholesale or retail trade and may not hold equity interests in non-bank undertakings exceeding in the aggregate 40% of the investing bank's capital funds. A bank's property investments (excluding business premises) are limited to 40% of its capital funds while lending for the purpose of property development/financing must not exceed 30% of a bank's deposits in Singapore (or 60% with the approval of the MAS).

5. Loan Concentrations and Country Risk

Loans to a single customer must not in total exceed 60% (or 100% with MAS approval) of the lending bank's capital. This provision is subject to a number of statutory exemptions which may be extended by the MAS at its discretion. The loan limit does not apply to country risk exposure involving several borrowers from the same country, although the MAS is beginning to monitor the country exposure of local banks on a consolidated basis. No limits on such exposure have as yet been imposed while foreign-owned banks are excluded from the monitoring process.

6. Foreign Currency Exposure

Although the MAS monitors the volume of banks' foreign currency trading, no exposure limits are imposed and regular prudential returns on foreign currency positions have recently been discontinued as part of the deregulation process. Spot checks on foreign currency exposure are undertaken during the course of bank examinations.

7. Bank Examination

On-site bank examinations by the MAS inspectorate (currently five in number) are undertaken on an occasional rather than a regular basis. The foreign establishments of local banks are not at present inspected and foreign supervisors are not permitted to inspect foreign-owned banks in Singapore. Bank secrecy laws prevent the communication to foreign supervisors of information relating to foreign-owned banks in Singapore.

8. Deposit Insurance

Singapore has no deposit insurance scheme although as a matter of record there have been no bank failures or deposit losses since the MAS was established in 1970.

9. Lender of Last Resort and Protective Arrangements

Routine liquidity assistance is provided to banks by the discount houses which in turn may look to the MAS for any funding shortfall. While preferring to exercise its lender of last resort function through the discount houses, the MAS does have broad statutory powers in this area. In particular, under a 1972 amendment to the Monetary Authority of Singapore Act the MAS "may, if it thinks such action is necessary to safeguard monetary stability, make a loan or advance to a bank carrying on business under the Banking Act or to such financial institutions or class of financial institutions as the Authority may from time to time approve against such forms of security as the Authority may consider sufficient".

Considerable importance is attached to letters of comfort as an additional safeguard for foreign-owned banks, while stand-by lines of credit are also encouraged. Finally, local branches of foreign banks are subject to separate liquidation proceedings in which branch depositors have prior claim to branch assets.

K. Switzerland

The Federal Banking Commission (FBC), which is independent of both the National Bank and the Federal Council, is charged with the supervision of the Swiss banking system. The National Bank's statutory functions are of a non-prudential nature although as a matter of practice it has maintained an active interest in this area. The FBC's supervisory activities are governed firstly by the Federal Law Relating to Banks and Savings Banks which dates back to the 1930s, and secondly by an Implementing Ordinance that has been periodically up-dated. Proposals for a new Banking Law are currently in the early stages of discussion but legislative action is probably several years away.

All banks having their residence in Switzerland are subject to the Banking Law, whether or not their business is conducted there. The Law applies equally to institutions conducting a banking business in Switzerland wherever their residence may be.

1. Entry Controls

In order to receive a licence from the FBC banks must meet certain statutory conditions. These include: (1) an organizational structure that

ensures effective supervision of the management; (2) a minimum capital of SF2 million; and (3) a management of sound reputation. Foreign-controlled banks are subject to supplementary requirements including reciprocal treatment of Swiss-controlled banks in their country of origin. Any institution has a right to obtain a licence once the statutory conditions have been satisfied.

2. *Capital Adequacy*

The reguations affecting capital adequacy (which apply equally to Swiss branches of foreign banks) have recently been amended. The new guidelines (1) shift the basis for calculating required capital ratios from outstanding liabilities to various categories of asset; (2) allow banks limited use of subordinated loans to meet capital requirements; (3) introduce new rules for banks' investments in non-banking assets; and (4) direct that consolidated accounts be used to assess capital needs.

Under this scheme required capital ratios are graduated according to the presumed riskiness of different types of asset, as illustrated by specifications of 6-8% for domestic advances, an additional 1.5 percentage point premium for foreign assets, 30% for property investment (20% for bank premises) and 40% for non-bank affiliates. Certain contingent liabilities are also subject to capital requirements, as are forward transactions in currencies, precious metals and securities (0.3%) and open positions in foreign currency (10%) and precious metals (20%). The ratios are guidelines rather than strict limits and may be varied by the FBC in special cases. They do not apply to fiduciary deposits (invested at the customers' risk but in the name of the Swiss bank receiving the deposit) although the National Bank has drawn attention to the fact that such deposits may involve risks both for the customer vis-a-vis the Swiss bank and for the Swiss bank vis-a-vis the ultimate borrower.

Capital is defined to include paid-in capital, published and undisclosed reserves and (a new addition) subordinated loans having at least seven years to maturity up to a maximum of 10% of total capital. As from January, 1982 Swiss banks can no longer cover losses from unpublished reserves without revealing this in their profit-and-loss accounts.

3. *Liquidity Control*

Banks must maintain an adequate balance of liquid and marketable assets in relation to short-term liabilities.

Liquid assets are defined as cash holdings and balances on giro and postal checking accounts, while marketable assets include bonds and bills that can be pledged/discounted at the National Bank, overdrafts se-

cured by such assets, inter-bank deposits maturing within one month, gold, bonds issued by sovereign borrowers and prime banker's acceptances maturing within three months. Short-term liabilities comprise all liabilities maturing within one month, sight deposits and 15% of savings deposits.

Short-term liabilities must be backed in some measure by liquid assets and in a greater measure by liquid plus marketable assets. The extent of this required backing increases as the proportion of short-term liabilities in the balance sheet rises so that, for instance, the marginal liquid asset backing jumps from 6% to 36% as short-term liabilities rise from 0-15% to over 35% of total liabilities. Liquid and marketable assets together must in any event amount to at least 6% of total liabilities. This approach to liquidity assessment is designed to place some formal limit on banks' maturity mis-matching, while also ensuring a minimum cushion of realizeable assets.

4. *Permissible Business Activities*

There are no formal restrictions on the kinds of business that banks may undertake, and in practice Swiss banks are universal rather than specialized. The public sector, represented by 30 cantonal banks and 45 banks belonging to districts and communities, has nevertheless tended in the past to attract the bulk of savings deposits.

5. *Loan Concentrations and Country Risk*

Loans to individual borrowers, measured as a proportion of the lending bank's capital, are subject to guidelines of 20% for unsecured loans and 40% for secured loans, with additional variations for inter-bank lending and loans to Swiss public bodies. The limits are now calculated on a consolidated basis and if exceeded must be reported to the FBC which may demand that the loans be reduced. On the other hand these restrictions do not apply directly to country risk where several borrowing entities from the same country may be involved.

The new solvency requirements (above) take some account of country of risk by specifying a 1.5 percentage point premium for foreign assets. In addition the FBC has recently issued a circular requiring auditors to include in their reports to the Commission a description of each bank's approach to country risk evaluation. The purpose of this requirement, however, is limited to ensuring that bank management is alert to the problem of measuring country risk, and no attempt is made by the FBC to form an independent view of particular countries' financial prospects.

6. *Foreign Exchange Exposure*

There are no specific limits on foreign exchange exposure other than the 10% incremental capital requirement for open currency positions (above). However, strong emphasis is placed by the FBC on the adequacy of internal control procedures.

7. *Bank Examination*

The FBC does not undertake on-site examinations of banks in the normal course of its supervisory duties. Instead, reliance is placed on independent bank auditors who have a special status under Swiss law. Such auditors are appointed and paid for by the banks but are licensed by the FBC for whom in effect they are required to act as agents. Auditors must ensure that all legal violations are promptly corrected or else reported to the FBC which must also be immediately informed of irregularities or losses that might jeopardize the security of depositors. The auditors' reports to the FBC (in contrast to shareholders' reports) must also reveal banks' true profits before adjustments to the inner reserves. Parent supervisors are not permitted to inspect foreign banks in Switzerland while their access to information is also limited by the Swiss bank secrecy laws.

8. *Deposit Insurance*

Switzerland does not yet possess a deposit insurance scheme, partly because central and other public sector banks have until recently attracted the major share of savings and other deposits from the general public. However, with the public's deposits being dispersed more widely among commercial banks proposals for such a scheme have been drafted by an expert committee and are now being considered in the context of broader banking reforms. The proposed system is mandatory, except for foreign banks having equivalent coverage from home-based schemes, and would be subject to a deposit ceiling equivalent to US $35,000. Protection would also be graduated so that only the first $10,000 would be fully covered, with a progressively increasing proportion of the loss born thereafter by the depositor. The introduction of any such scheme will have to await passage of the proposed new Banking Law which may take several years.

9. *Lender of Last Resort*

The National Bank law enumerates the Swiss National Bank's powers quite specifically but makes no reference to the lender of last resort function. On the other hand, this function may be viewed as an extension of the collateralized lending that the National Bank is authorized to un-

dertake for monetary policy purposes. In any event the National Bank confirmed its preparedness to act as lender of last resort when in April, 1977, it participated in a line of credit offered to Credit Suisse in the wake of the Chiasso Affair.

L. United Kingdom

The Banking Act of 1979, which for the first time provides a statutory basis for banking supervision within the UK, was drafted in response to the secondary banking crisis of 1973/74 and the harmonization requirements of the 1977 EEC Banking Directive. The Act imposes on the Bank of England primary responsibility for regulating and supervising deposit-taking business and for this purpose establishes two categories of institution: recognized banks and licensed deposit-takers. This two-tier system (which is not required by the EEC Directive) enables the Bank to maintain its traditional approach to the supervision of recognized banks based on direct contacts with management, while adopting more formal regulatory procedures in relation to licensed deposit takers.

1. Entry Controls

The statutory requirements for recognition as a bank by the Bank of England are more stringent than those for obtaining a deposit-taking license. The main criteria are: (1) adequacy of financial resources (including a minimum capital requirement); (2) high reputation and standing in the financial community; (3) provision of a specified range of financial services; and (4) a management of integrity and prudence commanding appropriate professional skills. UK subsidiaries of foreign banks apply for recognition (or a license) in their own right, although the reputation criterion attaches to their parent institutions. In contrast, UK branches of foreign banks must apply in their parent banks' name and for this purpose the Bank of England has statutory power to delegate assessment of the bank's management and financial soundness (though not reputation) to the parent supervisory authority. Furthermore, whereas the capital and other solvency criteria apply in the normal way to UK subsidiaries of foreign banks they are applied to the whole parent organization in the case of branches, there being no formal requirement as to branch capital.

2. Capital Adequacy

The Bank of England does not seek to apply a capital adequacy norm to all or any class of banks. However, it has devised two capital ratios

which, after taking into account the particular circumstances of each institution, are used as a basis for assessing capital adequacy. The Bank's approach is to take account of a banking group's consolidated worldwide operations in assessing capital needs, although UK subsidiaries of foreign banks are expected to be adequately capitalized in their own right.

The gearing ratio relates the capital base (with a deduction for premises) to all other non-capital liabilities apart from contingent liabilities. The purpose of this ratio is to ensure that a bank's capital position is regarded as acceptable by its depositors and other creditors. The second and more important calculation is the risk asset ratio which tests the adequacy of capital in relation to the risk of losses that may be sustained. For this purpose various classes of asset are weighted according to their supposed susceptibility to credit, investment and forced sale risk, commercial advances being taken as a benchmark and therefore accorded a uniform weighting of unity. The risk asset ratio is calculated by multiplying each balance sheet asset by its weight to produce an adjusted total of risk assets which is then related to the capital base. The capital base is defined to include share capital and reserves, subordinated debt with a minimum five years maturity up to a maximum of one third of total capital, and general bad debt provisions.

3. Liquidity Control

The Bank of England is still in the process of formulating its approach to the assessment of liquidity. However, in recent discussion papers it has developed a number of principles which are likely to be included in its final proposals. Most importantly, liquidity assessment should take account not merely of 'funding risk', that is the risk of not having available sufficient cash to meet obligations falling due on a particular day, but also the "interest-rate mismatch risk" whereby a bank engaging in maturity transformation may suffer losses as a result of movements in interest rates. Accordingly the Bank proposes to establish for each institution an estimate of liquidity needs made up of two components: (1) a proportion of its gross maturity-uncertain liabilities together with (2) a proportion of any net liability position arising from its maturity-certain liabilities and assets in a range of time-bands. Marketable assets would be placed at the start of the maturity ladder rather than according to their maturity date, although such assets would be subject to a discount where there is a credit, investment or forced sale risk. However, as with capital adequacy it is not intended that banks should conform to any standardized ratio.

The Bank of England recognizes that banks' international operations can lead to special problems in their liquidity management. Firstly, impediments on movements into or out of particular currencies may necessitate careful matching of maturity positions in those currencies. Secondly, banks may at times have to incur very high costs in order to obtain liquidity in a particular currency, because of their lack of direct access to the lender of last resort in that currency. However, it is not yet clear how overseas branches and subsidiaries of UK banks and UK branches and subsidiaries of overseas banks will be assessed for liquidity.

4. Permissible Business Activities

There are no specific controls on the types of business banks may engage in. However, the Bank of England would wish to ensure that any development of a bank's business could be accommodated comfortably within its managerial and financial resources.

5. Country Risk

Country exposure is monitored on a fully consolidated basis. For this purpose banks submit reports every six months detailing their claims on non-residents of the United Kingdom by borrower, country of borrower and maturity, with supplementary information on risk transfers (by guarantee) to third countries. Exposure to particular countries is then related to each bank's capital base and also aggregated in order to assess the overall exposure of the UK banking system. The Bank of England itself forms an independent judgement about the risks of lending to particular countries, using a three-fold classification based on the likelihood of debt servicing difficulties. However, there are no formal limits or norms for country exposure.

6. Foreign Exchange Exposure

The Bank of England's monitoring of foreign exchange risk is based on a distinction between 'structural' and 'dealing' positions in foreign currency. Structural exposure arising from a bank's fixed and long-term assets and liabilities is not subject to guidelines although it is included in the aggregate foreign currency position for purposes of capital adequacy assessment. In contrast, dealing positions reflecting day-to-day operations are subject to specific guidelines agreed individually with institutions. These guidelines are adapted to the particular circumstances and expertise of each bank but for those experienced in foreign exchange the limits would generally be: 10% of capital base for net dealing positions in any one currency and 15% of capital base for the aggregate net dealing position in all currencies taken together.

The Bank does not apply separate guidelines to UK branches of foreign banks where the branches' own internal controls (those exercised by its head office) and the monitoring arrangements of its own supervisory authority are considered satisfactory. On the other hand foreign branches (though not foreign subsidiaries) of UK banks are included in the Bank's guideline arrangements.

7. Bank Examination

There is no system of direct on-site examination of banks by the Bank of England and no regular assessment of the quality of a bank's loan portfolio (though details of large loans must be provided). The starting point for supervision is analysis of the relevant statistics which then provides the basis for interviews with senior management. These interviews are the cornerstone of the Bank's supervisory system, the prime aim being to build up over time an intimate picture of each institution and to assess the capabilities of management to control the business and fulfill its objectives. Branches of overseas banks undergo less comprehensive supervision because of the reliance placed on the parent bank's supervisory authority.

8. Deposit Insurance

The UK Banking Act provides for the introduction of a mandatory deposit insurance scheme which came into effect in February 1982. Under the new arrangements, 75% of a depositor's 'protected deposit' is insured, a protected deposit for this purpose being limited to £10,000 per institution. Inter-bank and foreign currency deposits are excluded from the scheme, as are certificates of deposit, secured deposits and deposits with a maturity of over five years. Protection does not extend to sterling deposits made with an institution's branches or subsidiaries outside the United Kingdom, while UK offices of overseas banks may be exempted from participation if their sterling deposit liabilities are already as well protected as they would be under the UK scheme. A deposit protection fund is to be established which will be funded from flat rate contributions by participant banks, calculated on the basis of their sterling deposits (subject to a maximum and minimum contribution that will tend to favor larger institutions). The initial fund will be £5-6 million, with power to borrow up to £10 million.

9. Lender of Last Resort

The Bank of England has a broad discretion to assist banks experiencing liquidity difficulties and/or threatened with insolvency. During and in the immediate aftermath of the UK secondary banking crisis of 1973/74 this discretion was exercised in a variety of forms which included unilateral support arrangements, joint support operations with the clearing

banks, the guaranteeing of a troubled bank's loan portfolio, the acquisition of another problematical loan portfolio and the acquisition of one institution as a subsidiary of the Bank.

The Bank's view is that its lender of last resort function extends to the foreign network of parent banks under its jurisdiction and that, similarly, UK branches and subsidiaries of overseas banks are, for this purpose, the responsibility of the parent institution's supervisory authority. At the same time the Bank seeks non-legally binding undertakings ("comfort letters") from shareholders of those UK banks which are overseas controlled to the effect that they acknowledge a responsibility extending beyond strict legal liability to support their UK bank affiliates.

M. United States

The structure of the US banking system reflects various statutory limitations (now under Congressional review) on geographic and functional diversification. In particular the effective prohibition of inter-state banking has led to a highly fragmented system comprising some 15,000 banks, while limitations on the kind of business banks may undertake has resulted in financial specialization between commercial, savings and investment banks. At the same time, the supervisory process has been considerably complicated by a dual banking structure dividing regulatory responsibilities between state and Federal authorities, as well as by the co-existence of three federal agencies concerned with the supervision of commercial banks.

In essence, the office of the Comptroller of the Currency (OCC) supervises banks with national charters (including federally licensed branches of foreign banks); the Federal Reserve Board (FRB) and the states supervise state-chartered, Federal Reserve member banks; the Federal Deposit Insurance Corporation (FDIC) and the states supervise state-chartered, insured, non-member banks (including insured state branches of foreign banks); and the states alone supervise state-chartered, non-member, uninsured banks.

1. Entry Controls

National banks are chartered by the OCC while state banks are chartered by the various state authorities. In considering charter applications, state and federal authorities apply similar criteria, including: (1) the bank's future earnings prospects; (2) the general character of the proposed management; (3) the adequacy of its proposed capital structure; and (4) the convenience to and needs of the community to be served.

Foreign banks seeking to establish branches, agencies or subsidiaries under state or federal license are subject to the same chartering criteria

and procedures as domestic banks. The establishment of foreign branches and subsidiaries of domestic banks is subject to approval by the FRB (or the FDIC in the case of State non-member banks).

2. Capital Adequacy

In addition to being considered at the chartering stage, capital adequacy is also monitored regularly as part of the bank examination process. For this purpose federal agencies rate capital in relation to: (1) the volume of risk assets; (2) the volume of inferior quality assets; (3) bank growth experience, plans and prospects; and (4) the strength of management. Furthermore, earnings trends and dividend pay-out ratios are examined in order to assess the prospective contribution of retained earnings to capital growth.

The OCC and the FRB have recently introduced common guidelines to be used in assessing capital adequacy which distinguish between primary and secondary capital. Primary capital consists of common and perpetual preferred stock, surplus and undivided profits, contingency and other capital reserves, mandatory convertible instruments and 100% of the allowances for possible loan losses. Secondary capital consists of limited-life preferred stock and subordinated notes and debentures; it can amount to no more than 50% of primary capital; and the secondary instruments must be phased out of the bank's capital beginning in the fifth year prior to maturity. Under these guidelines regional and smaller banks are subject to specified capital norms but multinational banks will continue to be assessed on an individual basis with a view to raising their capital ratios, in due course, closer to those of the smaller banks.

The FDIC has issued its own separate statement of policy on capital which excludes all subordinated debt from the evaluation process. This difference of approach reflects in part the FDIC's concern to protect depositors by ensuring the viability of banks as going concerns rather than by paying off depositors with failed banks.

Capital is evaluated by federal agencies on a worldwide consolidated basis. In the case of foreign joint ventures, account is taken of the possibility that financial support going beyond the initial investment by the US bank might be needed while consideration is also given to the fact that foreign branches and subsidiaries of US banks may be permitted to engage in riskier activities than their parent institutions. US subsidiaries of foreign banks are assessed for capital in the normal way, while federally licensed branches of foreign banks are required to hold at a member bank deposits or investment securities equal in value to 5% of their liabilities. These branch "capital equivalency deposits" (which

may also be required by state authorities for state licensed branches) are intended to ensure competitive equality by substituting for the capital required of national banks.

3. Liquidity Control

Liquidity is considered during the bank examination process although, no attempt is made to impose liquidity norms by means of published ratios. The federal agencies rate liquidity with respect to: (a) the volatility of deposits; (b) reliance on interest-sensitive funds and frequency and level of borrowings; (c) technical competence relative to structure of liabilities; (d) availability of assets readily convertible into cash; and (e) access to money markets or other ready sources of cash. The liquidity position is considered on a worldwide consolidated basis, although certain bank functions may be analyzed separately.

4. Permissible Business Activities

In general, commercial banks in the United States are confined to the business of commercial banking. They may not underwrite securities or engage in other securities-related activities or in commercial activities unrelated to banking, and they are subject to a variety of statutory restrictions on, for instance, real estate lending, permissible investment securities and the holding of corporate stocks. Since 1978, US branches and agencies (as well as subsidiaries) of foreign banks have been subject to parallel restrictions on their activities in the United States.

On the other hand the FRB, which regulates the foreign activities of most US banking organizations, permits foreign branches and subsidiaries of US banks to engage in a wider range of activities than would be allowed domestically so as to enable them to compete more equally with banks in the host country.

In recent years the strict separation of banking and non-banking activities in the US has been eroded, a fact which may soon be given legislative recognition as a result of deregulation proposals now before Congress.

5. Country Risk

Country risk is monitored and controlled in several ways. Firstly, exposure to country risk is measured on a world-wide consolidated basis by means of a semi-annual reporting system. This embraces cross-border and non-local currency loans to foreign borrowers adjusted for third country guarantees. Secondly, national banks are subject to a 10% of capital limit on loans to individual borrowers, a constraint now interpreted to apply to different public sector borrowing entities from the

same country where there is a common source of repayment. Thirdly, bank examiners assess each bank's system for evaluating country risk and its procedures for establishing country lending limits. Fourthly, loans to particular countries may, in extreme cases, be adversely classified either as 'substandard', where an interruption in debt servicing has occurred or is imminent, 'doubtful', where interest has been due and unpaid for an extended period, or 'loss' where there is little or no prospect of repayment. Finally, in less extreme cases, exposure to a particular country may be 'listed' or subject to comment in the examination report where the amount lent, measured as a percentage of capital, exceeds a specified prudent limit.

In order to co-ordinate their approach to country risk, the federal regulators have established an Inter-agency Country Exposure Review Committee which meets three times each year and votes either to classify loans to a particular country or to designate countries as strong, moderately strong or weak. The country designation determines the prudent exposure limit relative to capital, and therefore provides a basis for listing loans. This threshold is set at 25% for strong countries, 10% for moderately strong countries and 5% for weak countries. Listed exposures to weak and moderately strong countries may also be subject to special comment.

Five key ratios (among other critieria) are used to determine whether a country should be designated as strong, moderately strong or weak. These are:

1. The current account balance in the most recent year as a percentage of total exports of goods and services in that year.
2. The cumulative current account deficit in the three most recent years as a percentage of average annual export earnings during those years.
3. The net interest payments on external debt in the most recent year as a percentage of average annual export receipts during the three most recent years.
4. Net interest payments as a percentage of international reserves in the most recent period.
5. The total current debt-service requirements as a percentage of exports of goods and services.

6. *Foreign Exchange Exposure*

The regulatory authorities do not lay down any specific limits or guidelines for foreign exchange exposure. However, they do monitor individual bank positions through a reporting system requiring weekly exposure returns in nine currencies and monthly breakdowns of foreign

currency positions by maturity. The main focus of regulation is on banks' procedures for limiting foreign exchange risk and for this purpose the Uniform Guideline on Internal Control of Foreign Exchange in Commercial Banks sets out minimum standards for policy documentation, internal accounting controls and audit documentation.

7. Bank Examination

Regular bank examinations by the authorities' own examiners lie at the heart of the US supervisory process. Federal on-site examinations focus on (1) Capital adequacy; (2) Asset quality; (3) Management quality; (4) Earnings and profitability; and (5) Liquidity. This uniform rating system (known as "CAMEL") is used to arrive at an overall composit rating which identifies, on a scale of one to five, those banks which are in sound condition and those with weaknesses requiring closer supervisory attention. The examination process is buttressed by remote computer-based systems designed to monitor the condition of banks between examinations and to serve as an early warning system to detect potential weaknesses. The present emphasis is on strengthening these systems, so as to reduce the need for frequent, on-site examinations.

Federal examiners also conduct on-site examinations of foreign branches and, local laws permitting, foreign subsidiaries of US banks. US branches and subsidiaries of foreign banks are examined in the normal way although in these cases the Federal Reserve imposes extensive reporting requirements relating to the parent banks' structure and condition on the grounds that a parent bank's acitvities may affect the soundness of its foreign branches and subsidiaries.

8. Deposit Insurance

With the exception of three states, deposit insurance through the FDIC is a prerequisite to receiving a bank charter. US branches of foreign banks accepting retail deposits must also be insured, in which case, as a condition of insurance, the branch must pledge assets to the FDIC equal to 10% of total liabilities, representing security against any country or additional prudential risk beyond the US authorities' control. International Banking Facilities are not insured and foreign branches of US banks are currently outside the FDIC scheme. Insurance coverage is confined to non-bank deposits of residents and non-residents in any currency up to a ceiling of $100,000 per deposit. As a matter of practice the FDIC has preferred to use its powers to arrange assisted mergers for failing banks rather than to force closure and pay off insured depositors. One result of this policy is that uninsured deposits (now accounting for around one third of the total) have been effectively pro tected, with

99.9% of all depositors recovering the full amount of their deposits in failed banks during the period 1934 through 1980.

The FDIC is funded by member banks and currently manages an insurance fund of $12 billion, equivalent to over 1% of insured deposits, with authority to borrow up to $3 billion from the Treasury.

9. *Lender of Last Resort*

The Federal Reserve has statutory lending powers to discount eligible paper or make advances secured by satisfactory collateral. Such facilities are open to any bank which maintains reserves with the Federal Reserve, including the US branches, agencies or subsidiaries of foreign banks. The Federal Reserve may also provide indirect liquidity assistance to foreign establishments of US banks by channelling credit through the US parent/head office. The following kinds of support may be offered:

a. **Short-term adjustment credit.** This is available on a short-term basis to meet temporary requirements for funds or to cushion more persistent fund outflows pending an orderly adjustment of the borrowers' assets and liabilities. Credit under this heading is generally charged at the basic discount rate, although a variable surcharge may be applied to large, frequent borrowers.

b. **Extended seasonal credit.** This is available for longer periods to provide seasonal credit to smaller institutions lacking ready access to national money markets. Credit is generally charged at the basic discount rate.

c. **Other extended credit.** This may be provided to banks experiencing difficulties arising from exceptional circumstances or practices involving only that institution, if such assistance is in the public interest and the needed funds are not available from other sources. Such credit may also be provided where liquidity strains are affecting a broad range of institutions. A special rate above the basic discount rate may be charged.

d. **Emergency credit for others.** In unusual circumstances, individuals, partnerships and non-financial corporations may obtain emergency credit from the Federal Reserve if failure to obtain such credit would adversely affect the economy.

The Federal Reserve's lender of last resort function is designed to provide temporary liquidity to solvent institutions. Power to deal with insolvency is in the hands of the FDIC which has three main options in such emergencies. Firstly, it may pay off the depositors of a failed bank although this is not the preferred route given possible adverse confidence effects. Secondly, it may invite existing banks to bid to assume

the deposit liabilities of the failed bank and to purchase certain of its assets, including the goodwill (the 'purchase and assumption' option). And, finally, it may provide direct financial assistance to a bank which is in danger of closing. At present this last capital infusion option can be exercised only when the troubled bank is essential to its community, but the FDIC is seeking a statutory amendment which would remove the essentiality test and focus instead on situations where severe financial conditions are threatening the stability of a significant number of insured banks.

N. Observation Ratios Adopted by the EEC Advisory Banking Committee

The first EEC Banking Co-ordination Directive of 1977 provides, inter alia, for the establishment of "ratios between the various assets and/or liabilities of credit institutions with a view to monitoring their solvency and liquidity." Initially such ratios are to be used for observation purposes only, although the Directive evidently envisages the possibility that harmonized prudential ratios might be applied in the longer term. In 1980 the EEC Advisory Banking Committee began to define a number of observation ratios which are now being calculated on a trial basis for a sample of banks within each Member State.

The Advisory Committee currently employs three solvency ratios (a risk assets ratio, a gearing ratio and a large exposures ratio) as well as a profitability ratio and a liquidity ratio. These ratios embrace the activities of banks' foreign (and domestic) branches but because consolidated supervision has reached varying stages among different member states, there is no uniform approach to consolidation in the ratio calculations.

For the purposes of the solvency ratios capital is defined to include paid-up equity capital, reserves (hidden and published) and provisions with the character of reserves. However, because national practices with respect to subordinated debt vary, each solvency ratio is calculated twice, both including and excluding subordinated debt as allowable capital. Investments amounting to 20% or more of the share capital of bank affiliates are deducted so as to avoid double-counting capital that may be used as a basis for gearing both by the investing bank and the affiliate.

1. Risk Assets Ratio

The risk assets ratio is defined as the ratio of capital to risk assets. The Advisory Committee has also devised rules for weighting risk assets ac-

cording both to the nature and country of origin of borrowers. Thus borrowers are classified as governments (central and local), banks and private non-bank entities, while countries of origin are divided into a preferential zone, comprising all EEC countries plus other industrial countries, and a residual non-preferential zone. Claims on banks are classified by country of operation in the case of subsidiaries and by country of incorporation of the head office in the case of branches. The following weightings are applied:

a. **zero:** claims on or guaranteed by either preferential zone governments or specified international organizations.
b. **20 percent:** claims on or guaranteed by preferential zone banks, and contingent liabilities incurred on behalf of such banks.
c. **100 percent:** claims on non-preferential zone governments and banks, all claims on private non-bank borrowers, and contingent liabilities incurred on behalf of such entities. Fixed assets (comprising premises, other property, equipment and investments in non-bank affiliates) also come within this weighting category.

2. Gearing Ratio

This is defined as the ratio of capital to other liabilities, where "other liabilities" consist of all non-capital liabilities including acceptances and other contingent liabilities. Fiduciary accounts are excluded from the calculation.

3. Large Exposures Ratio

This is defined as the ratio of total large exposures to capital. A "large exposure" is the total of all commitments to a single borrower exceeding the following percentages of the lending bank's capital:

a. 20% in the case of exposures to private non-bank borrowers and non-preferential zone governments and banks.
b. 100% in the case of exposures to preferential zone banks.

Commitments to preferential zone governments and to specified international organizations are excluded from the large exposures definition. The Advisory Committee has accepted the desirability of grouping claims on different borrowers who may be legally or otherwise linked but is at present prevented by data deficiencies from adopting this approach.

4. Profitability Ratio

This ratio, which is also used in assessing solvency, has been calculated both as the ratio of gross profit to total assets and as the ratio of net profit to capital.

5. Liquidity Ratio

The first experimental liquidity ratio has been defined as the ratio of liquid assets to short-term liabilities. For this purpose liquid assets comprise notes and coin, gold, balances with the central bank, postal check accounts, inter-bank balances at call or notice of up to three months, assets rediscountable or eligible as collateral at the central bank, other money market instruments whose negotiability is considered by the supervisory authorities to be beyond doubt, and quoted debt securities. Short-term liabilities comprise all domestic and foreign currency liabilities of up to three months maturity, including all sight, term and savings deposits. Although the Advisory Committee favors the use of remaining rather than original maturity in calculating the maturities of assets and liabilities, it has not proved possible to standardize this practice.

Publications

Policy Statement:

The Problem of Exchange Rates
The Group of Thirty

Study Group Reports:

Toward a Less Unstable International Monetary System
The Reserve Assets Study Group

Foreign Exchange Markets Under Floating Rates
The Exchange Markets Participants' Study Group

Balance-of-Payments Problems of Developing Countries
The Capital Movements and the Growth of International Indebtedness Study Group

The Outlook for International Bank Lending
The Capital Movements and the Growth of International Indebtedness Study Group

Reserve Currencies in Transition
Robert V. Roosa, et al.

How Central Banks Manage Their Reserves
The Multiple Reserve Currency Study Group

How Bankers See the World Financial Market
The International Banking Study Group

Risks in International Bank Lending
The International Banking Study Group

Bank Supervision Around the World
Richard Dale

Occasional Papers:

1. **Exchange Rates, Domestic Prices, and the Adjustment Process**
   Peter B. Kenen and Clare Pack
2. **Credit Creation in the Euromarket: Alternative Theories and Implications for Control**
   Alexander K. Swoboda
3. **Views of Inflation in the United States**
   Herbert Stein
4. **"Overshooting" in the Foreign Exchange Market**
   Richard M. Levich
5. **Energy in the 1980s -- An Analysis of Recent Studies**
   Edwin A. Deagle, Jr., Bijan Mossavar-Rahmani, and Richard Huff
6. **The Role of Official Intervention**
   Michael Mussa
7. **Coordination of National Economic Policies**
   Jacques Polak
8. **Gradualism vs. Shock Therapy**
   William Fellner, et al.
9. **Policy Choice and Economic Structure**
   John B. Taylor
10. **Exchange Rate Policy Reconsidered**
    Otmar Emminger

Publications are available for a small charge or by subscription.

Address inquires to:

The Group of Thirty
Two World Trade Center
Suite 9630
New York, New York 10048
Tel: 212-775-9160